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WATER SUPPLY OUTLOOK FOR WASHINGTON

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U. S. DEPARTMENT of AGRICULTURE ★ SOIL CONSERVATION SERVICE

Collaborating with

DEPARTMENT OF ECOLOGY STATE OF WASHINGTON

AS OF
FEB. 1, 1976

Data included in this report were obtained by the agencies named above in cooperation with Federal, State and private organizations listed inside the back cover of this report.

TO RECIPIENTS OF WATER SUPPLY OUTLOOK REPORTS:

Most of the usable water in western states originates as mountain snowfall. This snowfall accumulates during the winter and spring, several months before the snow melts and appears as streamflow. Since the runoff from precipitation as snow is delayed, estimates of snowmelt runoff can be made well in advance of its occurrence. Streamflow forecasts published in this report are based principally on measurement of the water equivalent of the mountain snowpack.

Forecasts become more accurate as more of the data affecting runoff are measured. All forecasts assume that climatic factors during the remainder of the snow accumulation and melt season will interact with a resultant average effect on runoff. Early season forecasts are therefore subject to a greater change than those made on later dates.

The snow course measurement is obtained by sampling snow depth and water equivalent at surveyed and marked locations in mountain areas. A total of about ten samples are taken at each location. The average of these are reported as snow depth and water equivalent. These measurements are repeated in the same location near the same dates each year.

Snow surveys are made monthly or semi-monthly from January 1 through June 1 in most states. There are about 1900 snow courses in Western United States and in the Columbia Basin in British Columbia. Networks of automatic snow water equivalent and related data sensing devices, along with radio telemetry are expanding and will provide a continuous record of snow water and other parameters at key locations.

Detailed data on snow course and soil moisture measurements are presented in state and local reports. Other data on reservoir storage, summaries of precipitation, current streamflow, and soil moisture conditions at valley elevations are also included. The report for Western United States presents a broad picture of water supply outlook conditions, including selected streamflow forecasts, summary of snow accumulation to date, and storage in larger reservoirs.

Snow survey and soil moisture data for the period of record are published by the Soil Conservation Service by states about every five years. Data for the current year is summarized in a West-wide basic data summary and published about October 1 of each year.

COVER PHOTO: SURVEYOR ENROUTE TO THE MT. BALDY ARIZONA SNOW COURSE
SCS PHOTO AZ-5460

PUBLISHED BY SOIL CONSERVATION SERVICE

The Soil Conservation Service publishes reports following the principal snow survey dates from January 1 through June 1 in cooperation with state water administrators, agricultural experiment stations and others. Copies of the reports for Western United States and all state reports may be obtained from Soil Conservation Service, West Technical Service Center, Room 111, 511 N.W. Broadway, Portland, Oregon 97209.

Copies of state and local reports may also be obtained from state offices of the Soil Conservation Service in the following states:

STATE	ADDRESS
Alaska	204 E. 5th. Ave., Room 217, Anchorage, Alaska 99501
Arizona	6029 Federal Building, Phoenix, Arizona 85025
Colorado (N. Mex.)	P. O. Box 17107, Denver, Colorado 80217
Idaho	Room 345, 304 N. 8th. St., Boise, Idaho 83702
Montana	P.O. Box 98, Bozeman, Montana 59715
Nevada	P. O. Box 4850, Reno Nevada 89505
Oregon	1220 S.W. Third Ave., Portland, Oregon 97204
Utah	4012 Federal Bldg., 125 South State St., Salt Lake City, Utah 84138
Washington	360 U.S. Court House, Spokane, Washington 99201
Wyoming	P. O. Box 2440, Casper, Wyoming 82601

PUBLISHED BY OTHER AGENCIES

Water Supply Outlook reports prepared by other agencies include a report for California by the Water Supply Forecast and Snow Surveys Unit, California Department of Water Resources, P. O. Box 388, Sacramento, California 95802 --- and for British Columbia by the Department of Lands, Forests and Water Resources, Water Resources Service, Parliament Building, Victoria, British Columbia

U.S. DEPARTMENT of AGRICULTURE
CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY
SOIL CONSERVATION SERVICE

USDA-SCS-PORTLAND, OREG 1973

WATER SUPPLY OUTLOOK FOR WASHINGTON

and

FEDERAL - STATE - PRIVATE COOPERATIVE SNOW SURVEYS

Issued by

R.M. DAVIS

ADMINISTRATOR
SOIL CONSERVATION SERVICE
WASHINGTON, D C

Released by

GALEN S. BRIDGE

STATE CONSERVATIONIST
SOIL CONSERVATION SERVICE
SPOKANE, WASHINGTON

In Cooperation with

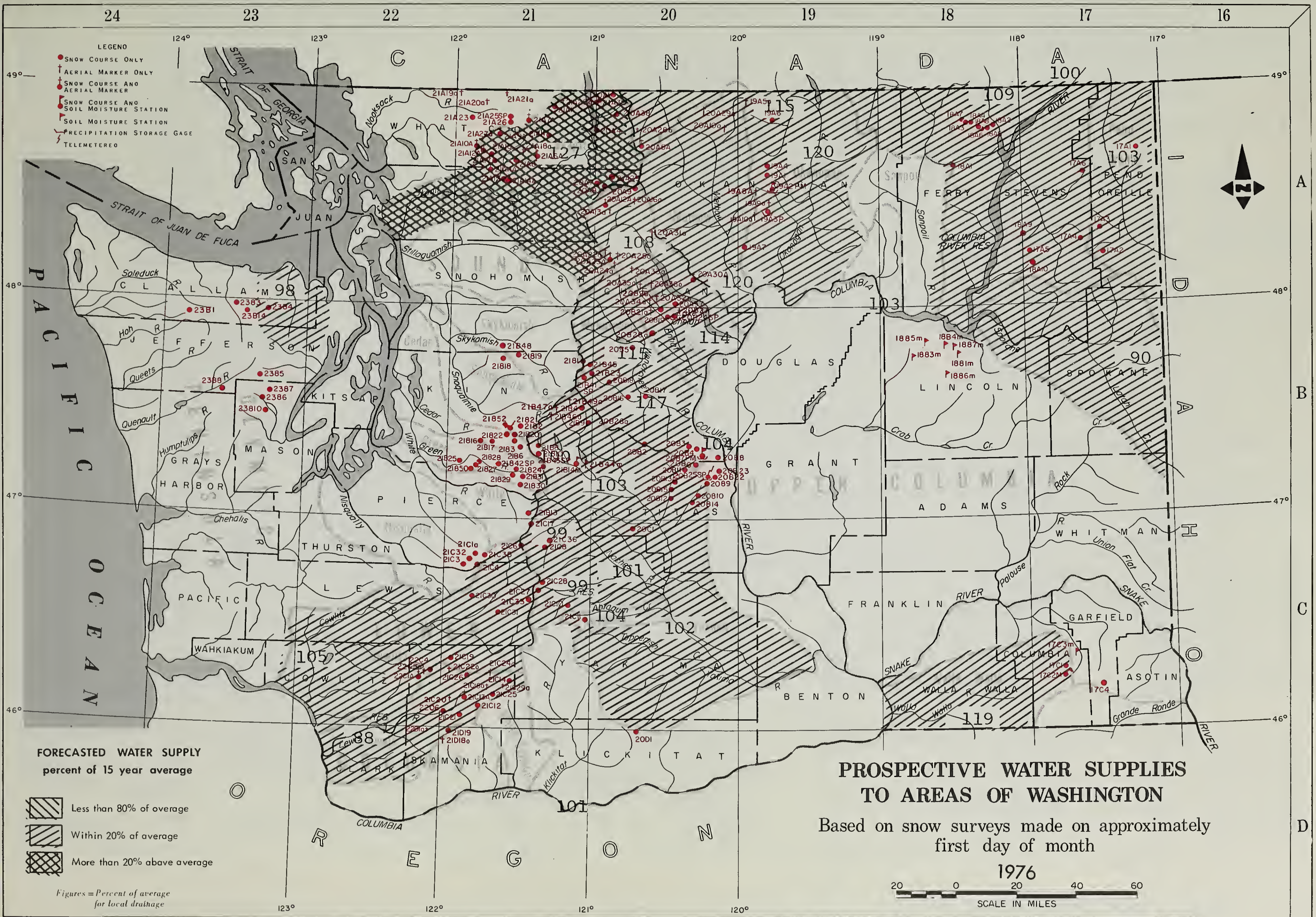
JOHN A. BIGGS

DIRECTOR
DEPARTMENT OF ECOLOGY
STATE OF WASHINGTON

Report prepared by

ROBERT T. DAVIS, Snow Survey Supervisor

SOIL CONSERVATION SERVICE
360 U.S. COURTHOUSE
SPOKANE, WASHINGTON 99201


PROSPECTIVE WATER SUPPLIES TO AREAS OF WASHINGTON
Based on snow surveys made on approximately first day of month
1976
LEGEND
Snow Course Only
Aerial Marker Only
Snow Course and Aerial Marker
Snow Course and Soil Moisture Station
Soil Moisture Station
Precipitation Storage Gage
Telemetered
FORECASTED WATER SUPPLY
percent of 15 year average
Less than 80% of average
Within 20% of average
More than 20% above average
Figures = Percent of average for local drainage
SCALE IN MILES
CANADA
IDAHO
OREGON
PACIFIC OCEAN
STRAIT OF JUAN DE FUCA
STRAIT OF GEORGIA
SAN JUAN
WHATCOM
OKANOGAN
FERRY
STEVENS
PEND OREILLE
CLALLAM
JEFFERSON
SNOHOMISH
CHELAN
DOUGLAS
LINCOLN
SPOKANE
KITSAP
KING
MASON
GRAYS HARBOR
PIERCE
KITTITAS
GRANT
ADAMS
WHITMAN
THURSTON
LEWIS
PACIFIC
YAKIMA
FRANKLIN
GARFIELD
ASOTIN
COLUMBIA
WALLA WALLA
BENTON
WAHKIAKUM
COWLITZ
SKAMANIA
KLICKITAT
CLARK
ISLAND
UPPER COLUMBIA
COLUMBIA RIVER RES.

INDEX to WASHINGTON SNOW COURSES, SOIL MOISTURE STATIONS and PRECIPITATION STORAGE GAGES

UPPER COLUMBIA DRAINAGE

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Pend Oreille River					
8oyer Mountain	17A2	7	31N	43E	5250
8unchgrass Meadow	17A1	24	37N	44E	5000
Winchester Creek	17A3	30	33N	43E	2970
Kettle River					
Boulder Road	18A2	36	39N	36E	1450
8utte Creek	18A3	2B	39N	35E	4070
Cabin Creek	18A8	5	38N	36E	3170
Goat Creek	18A4	26	39N	35E	3595
Snow Caps Creek	18A5	3	38N	36E	2150
Snow Caps Trail	18A6	5	38N	36E	2720
Summit G. S.	18A7	20	39N	35E	4600
Colville River					
Baird	17A6	19	36N	42E	3215
Carlson	18A9	34	32N	3BE	2BB5
Chewelah	17A4	11	32N	41E	4925
Stranger Mountain	17A5	26	31N	3BE	4990
Togo	1BA10	6	29N	38E	3370
Sanpoil River					
Sherman Creek Pass	18A1	19	36N	35E	5350
Okanogon River					
Clark	19A8a	2	36N	23E	7000
Muckamuck	19A9a	20	36N	24E	6750
Mutton Creek No. 1	19A1	30	37N	24E	5700
Mutton Creek No. 2	19A4	19	37N	24E	6000
Paysayten	20A2Ba	32	40N	18E	4300
Rusty Creek	19A3P	1B	35N	24E	4000
Salmon Meadows	19A2PM	33	37N	24E	4500
Starvation Mtn.	19A10a	15	35N	23E	6750
Touts Coulee	19A6	30	39N	25E	2B45
Methow River					
Billy Goat Pass	20A10a	10	38N	20E	6400
Dollar Watch	20A29a	8	39N	20E	7000
Harts Pass	20A5A	7	37N	18E	6500
Horseshoe Basin	19A5a	15	40N	23E	7000
Loup Loup	19A7	36	34N	23E	4650
Chelan Lake Basin					
Cloudy Pass	20A22a	12	31N	15E	6500
Greenwood Flat	20A25a	3	31N	16E	3540
Little Meadows	20A24a	B	31N	16E	5275
Lyman Lake	20A23a	1B	31N	16E	5900
Park Creek Flat	20A13a	19	34N	16E	2220
Park Creek Ridge	20A12A	18	34N	16E	4600
Petersons	20A16a	3	34N	17E	3730
Rainy Pass	20A9	21	35N	17E	47B0
Safety Harbor	20A30A	32	31N	20E	6300
War Creek Pass	20A31a	34	33N	18E	6500
Entiat River					
Blue Creek G.S.	20B28a	19	2BN	1BE	5425
Brief	20B19	34	28N	19E	1600
Entiat Meadows	20A33a	28	31N	17E	4800
Entiat River Trail	20A34a	2	29N	17E	3150
Four Mile Ridge	20B27a	15	2BN	19E	7000
Fox Camp	20A36a	17	30N	1BE	6510
Pope Ridge	20B20	22	29N	1BE	4300
Pope Ridge Snow Pillow	20B24SP	22	29N	1BE	4300
Pugh Ridge	20A32a	34	30N	1BE	6400
Shady Pass	20A37	20	29N	19E	6200
Snow Brushy	20A35a	21	30N	17E	3850
Tommy Creek	20B21a	10	28N	1BE	5300
Wenotchee River					
Berne-Mill Creek	21B23	7	26N	15E	3170
Berne-Mill Creek (New)	21B41SP	13	26N	14E	3240
Blewett Pass No. 2	20B2	35	22N	17E	4270
Chiwaukum G. S.	20B16	4	25N	17E	1B10
Lake Wenatchee	20B5	33	27N	17E	1970
Leavenworth R. S.	20B17	1	24N	17E	1127
Merritt	20B18	4	26N	16E	2140
Stevens Pass	21B1	14	26N	13E	4070
Stevens Pass Sand Shed	21B45	12	26N	19E	3700
Wenotchee River (continued)					
Trough #2	20B25SP	10	20N	20E	5310
Colockum Creek					
Colockum Creek Upper	20B22	11	20N	20E	5300
Colockum Creek Lower	20B23	1	20N	20E	4300
Squilchuck Creek					
Beehive Springs	20B3	12	21N	19E	4400
Scout-A-Vista	20B4	18	21N	20E	3400
Stemilt Creek					
Jump-Off	20B8	34	21N	20E	4450
Stemilt Slide	20B6	30	21N	20E	5000
Upper Wheeler	2087PM	30	21N	20E	4400
Crab Creek					
Creston-Kunz	1BB1m	32	27N	34E	2440
Jack Woods	18B3m	28	27N	31E	2750
Krause	1BB4m	21	27N	33E	2420
Sheffels	18B5m	17	27N	32E	237B
Sherman	1BB7m	24	27N	33E	2440
Wheatridge	1BB6m	24	25N	32E	2290
Yakima River					
Ahtanum R. S.	21C11	24	12N	14E	3100
Big Boulder Creek	21B9	35	23N	14E	3200
Bumping Lake	21C8	23	16N	12E	3450
Bumping Lake New	21C36	13	16N	12E	3400
Colockum Pass	20B9	25	20N	20E	5370
Cooke Creek	20810	17	19N	20E	4123
Domery Flat	21B44m	15	20N	14E	2200
Fish Lake	21B4	34	24N	14E	3371
Green Lake	21C10	3	12N	13E	6000
Grouse Camp	20B11	29	21N	19E	53B5
High Creek	20B12	34	20N	19E	293C
Joe Lake	21846a	22	23N	12E	4624
Lake Cle Elum	21B14M	15	20N	14E	2200
Lemah Creek	21B47a	7	23N	13E	3327
Nanastash	20C1	24	17N	16E	3935
Morse Lake	21C17	6	16N	11E	5400
Nanum	20B13	4	20N	19E	3875
Trail Creek	20B14	20	19N	20E	3360
Tunnel Avenue	21BB	13	21N	11E	2450
Van Epps Pass	20B26a	16	23N	15E	5925
Walters Flat	20B15	22	20N	19E	3360
Waptus Lake	21B49a	12	23N	13E	3024
White Pass (East Side)	21C2B	2	13N	11E	4500
White Pass (Leach Lake)	21C27	1	13N	11E	4500

LOWER COLUMBIA DRAINAGE

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Asotin Creek					
Spruce Springs	17C4	9	BN	40E	5700
Mill Creek					
Couse	17C3m	2	9N	40E	3370
Homestead	17C1	11	9N	40E	4030
Martin Springs (Helmers SM)	17C2M	23	9N	40E	4400
Klickitat River					
Satus Pass	20D1	21	6N	17E	4030
White Salmon River					
Cultus Creek	21C12	35	7N	BE	4000
Lewis River					
Blue Lake	21C22a	19	9N	BE	4B00
Bob's Trail	21C21	25	BN	7E	2200
Calamity Ridge	22D1a	8	5N	5E	2500
Council Pass	21C1Ba	24	9N	9E	4200
Lewis River (continued)					
Divide Meadow	21C29a	21	9N	10E	5600
Grand Meadow	21C25	2B	8N	9E	3500
Lone Pine Shelter	21C26	8	9N	7E	3800
Marble Mountain	22C5a	24	8N	5E	3200
New Muddy River	22C6	36	8N	6E	200C
Oldman Pass	21D19	22	6N	7E	3100
Plains of Abraham	22C1a	35	9N	5E	4400
Smith Creek Road	22C4	29	9N	6E	2100
Spencer Meadow	21C20a	16	BN	7E	3400
Surprise Lakes	21C13A	14	7N	BE	4250
Table Mountain	21C24a	20	9N	9E	4200
Timbered Peak	21D1Ba	36	6N	6E	3000
Cowlitz River					
Cayuse Pass	21C6	15	16N	10E	5300
Mosquito Meadows	21C19	33	10N	7E	4100
Ohanapecosh	21C32	2B	15N	10E	2200
Packwood Lake	21C31	21	13N	10E	2870
Pigtail Peak	21C33	11	13N	11E	5900
Potato Hill	21C14	36	10N	10E	4500
Willame Creek	21C30	3	13N	8E	3250

PUGET SOUND DRAINAGE

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Nisqually River					
Ghost Forest	21C4	23	15N	BE	4550
Longmire	21C3	29	15N	BE	2760
Paradise Park (New)	21C35	13	15N	BE	5500
Stem Glade	21C1	13	15N	BE	5050
White River					
Corral Pass	21B13	30	1BN	11E	6000
Green River					
Airstrip	21B24	1B	20N	11E	1800
Charley Creek	21B25	27	21N	BE	1200
Cougar Mountain	21B42SP	21	21N	9E	3200
Grass Mountain No. 2	21B27	14	20N	8E	2900
Grass Mountain No. 3	21B2B	12	20N	8E	2100
Lester Creek	21B29	36	20N	10E	3100
Lynn Lake	21B50	21	20N	BE	4000
Sawmill Ridge	21B31	5	19N	11E	4700
Snowshoe Butte	21B43SP	14	20N	11E	5000
Stampede Pass	21B10	25	21N	11E	3B60
Twin Camp	21B30	1B	19N	11E	4100
Cedar River					
City Cabin	21B3	10	21N	10E	2390
Mt. Gardner	21B21	30	22N	10E	3300
Mt. Gardner Aux.	21B22	31	22N	10E	2500
Mt. Lindsay	21816	31	22N	9E	2500
Mt. Washington New	21B52	B	22N	9E	3000
Rex River	21B17	11	21N	9E	2400
South Fork Cedar	21B6	24	21N	10E	3000
Tinkham Creek	21820	1	21N	10E	3400
Snoqualmie River					
Alpine Meadow	21B4B	31	27N	9E	3500
Olallie Meadows	21B2	19	22N	11E	3625
South Fork Tolt	21B1B	26	26N	9E	1900
Skykomish River					
Lake Elizabeth	21B19	33	26N	10E	2900
Skogit River					
8eaver Creek Trail	21A4	35	39N	12E	2200
Beaver Pass	21A1	9	39N	12E	36B0
Brown Top	21A28a	26	40N	12E	6000
Devils Park	20A4	34	38N	16E	5900
Freezeout Creek Trail	20A1	14	40N	14E	3500
Freezeout Meadow New	20A38	8	40N	16E	5000
Granite Creek	21A29	25	36N	16E	3500
Meadows Cabins	20AB	29	36N	14E	1900
New Hozomeen Lake	20A7	19	40N	14E	2B00
Thunder Basin	21A30	10	35N	14E	4200
Baker River					
Baker Pass	21A27a	1	37N	7E	4900
Dock Butte	21A11A	8	36N	BE	3B00
Easy Pass	21A7A	19	39N	11E	5200
Jasper Pass	21A6A	17	3BN	11E	5400
Komo Kulshan	21A17	31	37N	9E	B00
Marten Lake	21A9A	23	38N	8E	3600
Mount Blum	21A1Ba	27	38N	10E	5B00
Rocky Creek	21A12A	20	37N	BE	2100
Schreibers Meadow	21A10A	1B	37N	8E	3400
S. F. Thunder Creek	21A14A	20	36N	9E	2200
Sulphur Creek	21A13	22	37N	BE	1600
Three Mile Creek	21A15	1B	36N	9E	1600
Watson Lakes	21A8	25	37N	9E	4500
Nooksack River					
Bald Mountain	21A19a	7	40N	7E	4400
Canyon	21A20A	20	40N	8E	5100
Glacier Creek	21A23	9-10	38N	7E	3700
Panorama New	21A26	17	39N	9E	4300
Panorama Snow Pillow	21A25SP	17	39N	9E	4300
Twin Lakes	21A21a	16	40N	9E	5200

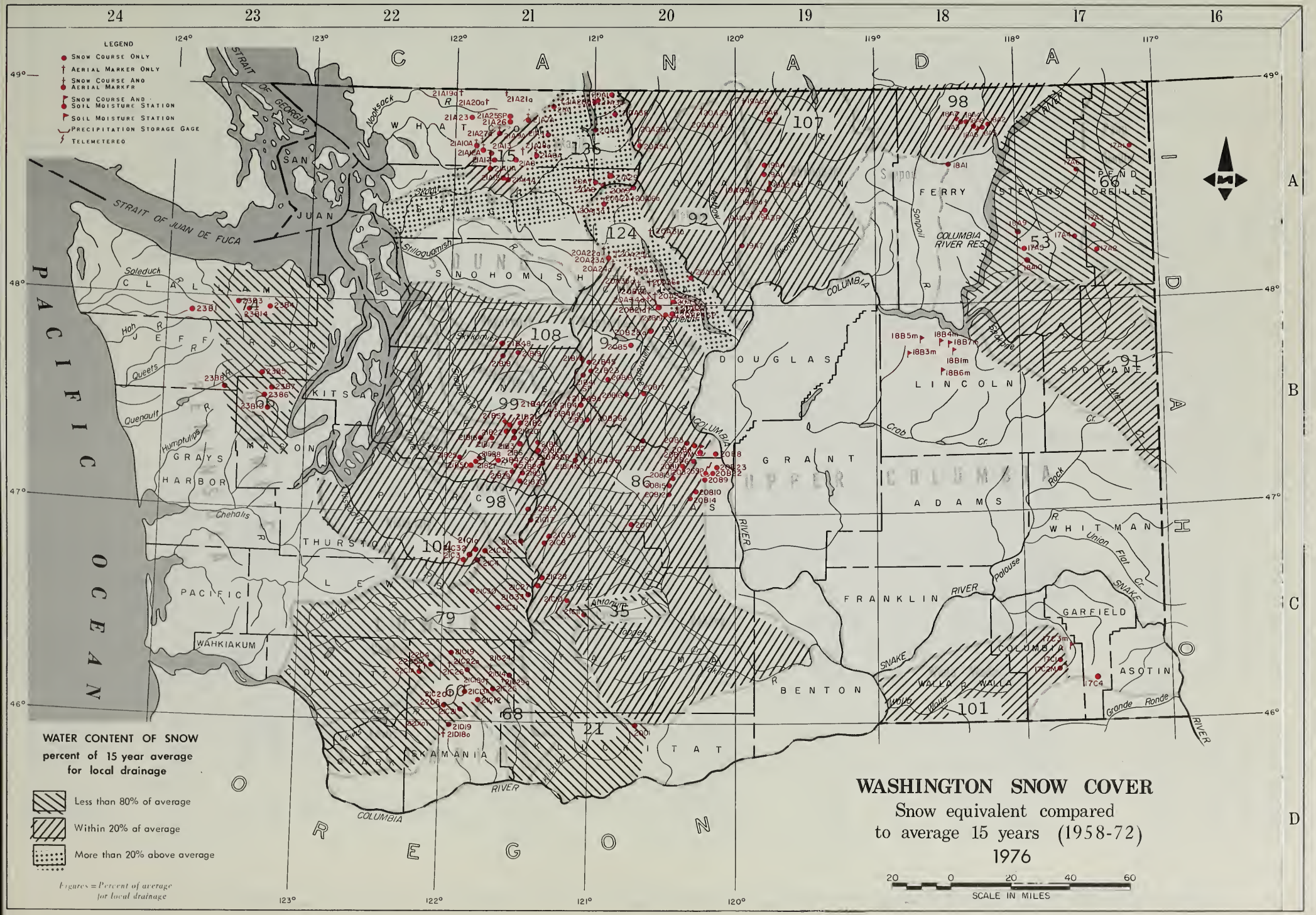
OLYMPIC PENINSULA

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Dungeness River					
Deer Park	23B4	1	2BN	5W	5200
Morse Creek					
Cox Valley	23814	31	29N	6W	4500
Elwha River					
Hurricane	23B3	36	29N	7W	4500
Skokomish River					
Black and White	23B7	17	24N	5W	4200
Black and White Lakes	2386	16	24N	5W	4700
Four Stream	23B10	1	23N	6W	3000
Home Sweet Home	23B5	2B	25N	5W	5200
Sundown Pass	23BB	25	24N	7W	3900
Soleduck River					
Deer Lake	23B1	14	28N	9W	3900

LEGEND

NUMBERING SYSTEM EXAMPLE

21A7	SNOW COURSE ONLY
21A7a	AERIAL MARKER ONLY
21A7A	SNOW COURSE AND AERIAL MARKER
21A7M	SNOW COURSE AND SOIL MOISTURE STATION
21A7m	SOIL MOISTURE STATION
21A7P	SNOW COURSE AND PRECIPITATION STORAGE GAGE
21A7p	PRECIPITATION STORAGE GAGE
21A7SP	SNOW PILLOW


WASHINGTON SNOW COVER
Snow equivalent compared
to average 15 years (1958-72)
1976
LEGEND
Snow Course Only
Aerial Marker Only
Snow Course And Aerial Marker
Snow Course And Soil Moisture Station
Soil Moisture Station
Precipitation Storage Gage
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WATER CONTENT OF SNOW
percent of 15 year average
for local drainage
Less than 80% of average
Within 20% of average
More than 20% above average
Figures = Percent of average for local drainage
SCALE IN MILES
CANADA
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KLICKITAT
YAKIMA
KITTITAS
CHELAN
DOUGLAS
GRANT
ADAMS
LINCOLN
SPOKANE
FERRY
STEVENS
PEND OREILLE
WHITMAN
FRANKLIN
GARFIELD
COLUMBIA
ASOTIN
BENTON
WALLA WALLA
COLUMBIA RIVER RES.
UPPER COLUMBIA
Nooksack
Skagit
Stillaguamish
Snohomish
Skykomish
Snoqualmie
Cedar
Green
White
Puyallup
Nisqually
Cowlitz
Lewis
Chehalis
Humptulips
Hoh
Queets
Quenault
Soleduck
Methow
Okanogan
Sanpoil
Spokane
Chelan
Entiat
Wenatchee
Tieton
Naches
Ahtanum
Yakima
Toppenish
Satus
Klickitat
Little White Salmon
Wind
Little Spokane
Crab Cr.
Rock Cr.
Palouse
Union Flat Cr.
Adams Cr.
Grande Ronde
Walla Walla
Touchet
Tucannon
Snake
Columbia
Pend Oreille
Kettle
Similkameen
Okanogan
Methow
Wenatchee
Entiat
Chelan
Stehekin
Skagit
Nooksack
Stillaguamish
Snohomish
Skykomish
Snoqualmie
Cedar
Green
White
Puyallup
Nisqually
Cowlitz
Lewis
Chehalis
Humptulips
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Soleduck
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Klickitat
Little White Salmon
Wind
Little Spokane
Crab Cr.
Rock Cr.
Palouse
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Touchet
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Okanogan
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INDEX to WASHINGTON SNOW COURSES, SOIL MOISTURE STATIONS and PRECIPITATION STORAGE GAGES

UPPER COLUMBIA DRAINAGE

Pend Oreille River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Boyer Mountain	17A2	7	31N	43E	5250
Bunchgrass Meadow	17A1	24	37N	44E	5000
Winchester Creek	17A3	30	33N	43E	2970

Kettle River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Boulder Road	18A2	36	39N	36E	1450
Butte Creek	18A3	28	39N	35E	4070
Cabin Creek	18A8	5	3BN	36E	3170
Goat Creek	18A4	26	39N	35E	3595
Snow Caps Creek	18A5	3	3BN	36E	2150
Snow Caps Trail	18A6	5	3BN	36E	2720
Summit G. S.	18A7	20	39N	35E	4600

Colville River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Baird	17A6	19	36N	42E	3215
Carlson	18A9	34	32N	3BE	2BB5
Chewelah	17A4	11	32N	41E	4925
Stranger Mountain	17A5	26	31N	38E	4990
Togo	18A10	6	29N	3BE	3370

Sanpoil River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Sherman Creek Pass	18A1	19	36N	35E	5350

Okanogan River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Clark	19A8a	2	36N	23E	7000
Muckamuck	19A9a	20	36N	24E	6750
Mutton Creek No. 1	19A1	30	37N	24E	5700
Mutton Creek No. 2	19A4	19	37N	24E	6000
Paysayten	20A2Ba	32	40N	1BE	4300
Rusty Creek	19A3P	1B	35N	24E	4000
Salmon Meadows	19A2PM	33	37N	24E	4500
Starvation Mtn.	19A10a	15	35N	23E	6750
Touts Coulee	19A6	30	39N	25E	2B45

Methow River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Billy Goat Pass	20A10a	10	3BN	20E	6400
Dollar Watch	20A29a	8	39N	20E	7000
Harts Pass	20A5A	7	37N	1BE	6500
Horseshoe Basin	19A5a	15	40N	23E	7000
Loup Loup	19A7	36	34N	23E	4650

Chelan Lake Basin

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Cloudy Pass	20A22a	12	31N	15E	6500
Greenwood Flat	20A25a	3	31N	16E	3540
Little Meadows	20A24a	B	31N	16E	5275
Lyman Lake	20A23a	1B	31N	16E	5900
Park Creek Flat	20A13a	19	34N	16E	2220
Park Creek Ridge	20A12A	1B	34N	16E	4600
Petersons	20A16a	3	34N	17E	3730
Rainy Pass	20A9	21	35N	17E	47B0
Safety Harbor	20A30A	32	31N	20E	6300
War Creek Pass	20A31a	34	33N	18E	6500

Entiat River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Blue Creek G.S.	20B28a	19	2BN	18E	5425
Brief	20B19	34	28N	19E	1600
Entiat Meadows	20A33a	28	31N	17E	4B00
Entiat River Trail	20A34a	2	29N	17E	3150
Four Mile Ridge	20B27a	15	28N	19E	7000
Fox Camp	20A36a	17	30N	1BE	6510
Pope Ridge	20B20	22	29N	1BE	4300
Pope Ridge Snow Pillow	20B24SP	22	29N	1BE	4300
Pugh Ridge	20A32a	34	30N	18E	6400
Shady Pass	20A37	20	29N	19E	6200
Snow Brushy	20A35a	21	30N	17E	3B50
Tommy Creek	20B21a	10	2BN	1BE	5300

Wenatchee River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Berne-Mill Creek	21B23	7	26N	15E	3170
Berne-Mill Creek (New)	21B41SP	13	26N	14E	3240
Blewett Pass No. 2	20B2	35	22N	17E	4270
Chiwaukum G. S.	20B16	4	25N	17E	1B10
Lake Wenatchee	20B5	33	27N	17E	1970
Leavenworth R. S.	20B17	1	24N	17E	1127
Merritt	20B18	4	26N	16E	2140
Stevens Pass	21B1	14	26N	13E	4070
Stevens Pass Sand Shed	21B45	12	26N	19E	3700

Wenatchee River (continued)

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Trough #2	20B25SP	10	20N	20L	5310

Colockum Creek

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Colockum Creek Upper	20B22	11	20N	20E	5300
Colockum Creek Lower	20B23	1	20N	20E	4300

Squilchuck Creek

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Beehive Springs	20B3	12	21N	19E	4400
Scout-A-Vista	20B4	1B	21N	20E	3400

Stemilt Creek

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Jump-Off	20BB	34	21N	20E	4450
Stemilt Slide	20B6	30	21N	20E	5000
Upper Wheeler	20B7PM	30	21N	20E	4400

Crab Creek

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Creston-Kunz	18B1m	32	27N	34E	2440
Jack Woods	1BB3m	2B	27N	31E	2750
Krause	1BB4m	21	27N	33E	2420
Sheffels	18B5m	17	27N	32E	237B
Sherman	1BB7m	24	27N	33E	2440
Wheatridge	18B6m	24	25N	32E	2290

Yakima River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Ahtanum R. S.	21C11	24	12N	14E	3100
Big Boulder Creek	21B9	35	23N	14E	3200
Bumping Lake	21CB	23	16N	12E	3450
Bumping Lake New	21C36	13	16N	12E	3400
Colockum Pass	20B9	25	20N	20E	5370
Cooke Creek	20B10	17	19N	20E	4123
Domery Flat	21B44m	15	20N	14E	2200
Fish Lake	21B4	34	24N	14E	3371
Green Lake	21C10	3	12N	13E	6000
Grouse Camp	20B11	29	21N	19E	53B5
High Creek	20B12	34	20N	19E	293C
Joe Lake	21B46a	22	23N	12E	4624
Lake Cle Elum	21B14M	15	20N	14E	2200
Lemah Creek	21B47a	7	23N	13E	3327
Manastash	20C1	24	17N	16E	3935
Morse Lake	21C17	6	16N	11E	5400
Nanum	20B13	4	20N	19E	3875
Trail Creek	20B14	20	19N	20E	3360
Tunnel Avenue	21BB	13	21N	11E	2450
Van Epps Pass	20B26a	16	23N	15E	5925
Walters Flat	20B15	22	20N	19E	3360
Waptus Lake	21B49a	12	23N	13E	3024
White Pass (East Side)	21C2B	2	13N	11E	4500
White Pass (Leach Lake)	21C27	1	13N	11E	4500

LOWER COLUMBIA DRAINAGE

Asotin Creek

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Spruce Springs	17C4	9	BN	40E	5700

Mill Creek

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Couse	17C3m	2	9N	40E	3370
Homestead	17C1	11	9N	40E	4030
Martin Springs (Helmers SM)	17C2M	23	9N	40E	4400

Klickitat River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Satus Pass	20D1	21	6N	17E	4030

White Salmon River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV
Cultus Creek	21C12	35	7N	BE	4000

Lewis River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Blue Lake	21C22a	19	9N	BE	4B00
Bob's Trail	21C21	25	BN	7E	2200
Calamity Ridge	22D1a	B	5N	5E	2500
Council Pass	21C18a	24	9N	9E	4200

Lewis River (continued)

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Divide Meadow	21C29a	21	9N	10E	560C
Grand Meadow	21C25	2B	BN	9E	3500
Lone Pine Shelter	21C26	B	9N	7E	3B00
Marble Mountain	22C5a	24	8N	5E	3200
New Muddy River	22C6	36	BN	6E	200C
Oldman Pass	21D19	22	6N	7E	3100
Plains of Abraham	22C1a	35	9N	5E	4400
Smith Creek Road	22C4	29	9N	6E	2100
Spencer Meadow	21C20a	16	8N	7E	3400
Surprise Lakes	21C13A	14	7N	BE	4250
Table Mountain	21C24a	20	9N	9E	4200
Timbered Peak	21D1Ba	36	6N	6E	3000

Cowlitz River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Cayuse Pass	21C6	15	16N	10E	5300
Mosquito Meadows	21C19	33	10N	7E	4100
Ohanapecosh	21C32	28	15N	10E	2200
Packwood Lake	21C31	21	13N	10E	2870
Pigtail Peak	21C33	11	13N	11E	5900
Potato Hill	21C14	36	10N	10E	4500
Willame Creek	21C30	3	13N	8E	3250

PUGET SOUND DRAINAGE

Nisqually River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Ghost Forest	21C4	23	15N	BE	4550
Longmire	21C3	29	15N	BE	2760
Paradise Park (New)	21C35	13	15N	BE	5500
Stem Glade	21C1	13	15N	BE	5050

White River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Corral Pass	21B13	30	1BN	11E	6000

Green River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Airstrip	21B24	18	20N	11E	1B00
Charley Creek	21B25	27	21N	BE	1200
Cougar Mountain	21B42SP	21	21N	9E	3200
Grass Mountain No. 2	21B27	14	20N	8E	2900
Grass Mountain No. 3	21B28	12	20N	8E	2100
Lester Creek	21B29	36	20N	10E	3100
Lynn Lake	21B50	21	20N	BE	4000
Sawmill Ridge	21B31	5	19N	11E	4700
Snowshoe Butte	21B43SP	14	20N	11E	5000
Stampede Pass	21B10	25	21N	11E	3860
Twin Camp	21B30	1B	19N	11E	4100

Cedar River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
City Cabin	21B3	10	21N	10E	2390
Mt. Gardner	21B21	30	22N	10E	3300
Mt. Gardner Aux.	21B22	31	22N	10E	2500
Mt. Lindsay	21B16	31	22N	9E	2500
Mt. Washington New	21B52	8	22N	9E	3000
Rex River	21B17	11	21N	9E	2400
South Fork Cedar	21B6	24	21N	10E	3000
Tinkham Creek	21B20	1	21N	10E	3400

Snoqualmie River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Alpine Meadow	21B4B	31	27N	9E	3500
Olallie Meadows	21B2	19	22N	11E	3625
South Fork Tolt	21B1B	26	26N	9E	1900

Skykomish River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Lake Elizabeth	21B19	33	26N	10E	2900

Skagit River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Beaver Creek Trail	21A4	35	39N	12E	2200
Beaver Pass	21A1	9	39N	12E	36B0
Brown Top	21A2Ba	26	40N	12E	6000
Devils Park	20A4	34	3BN	16E	5900
Freezeout Creek Trail	20A1	14	40N	14E	3500
Freezeout Meadow New	20A38	B	40N	16E	5000
Granite Creek	21A29	25	36N	16E	3500
Meadows Cabins	20A8	29	36N	14E	1900
New Hozomeen Lake	20A7	19	40N	14E	2B00
Thunder Basin	21A30	10	35N	14E	4200

Baker River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Baker Pass	21A27a	1	37N	7E	4900
Dock Butte	21A11A	8	36N	BE	3B00
Easy Pass	21A7A	19	39N	11E	5200
Jasper Pass	21A6A	17	3BN	11E	5400
Komo Kulshan	21A17	31	37N	9E	B00
Marten Lake	21A9A	23	3BN	BE	3600
Mount Blum	21A1Ba	27	3BN	10E	5B00
Rocky Creek	21A12A	20	37N	BE	2100
Schreibers Meadow	21A10A	1B	37N	8E	3400
S. F. Thunder Creek	21A14A	20	36N	9E	2200
Sulphur Creek	21A13	22	37N	BE	1600
Three Mile Creek	21A15	1B	36N	9E	1600
Watson Lakes	21AB	25	37N	9E	4500

Nooksack River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Bald Mountain	21A19a	7	40N	7E	4400
Canyon	21A20A	20	40N	BE	5100
Glacier Creek	21A23	9-10	3BN	7E	3700
Panorama New	21A26	17	39N	9E	4300
Panorama Snow Pillow	21A25SP	17	39N	9E	4300
Twin Lakes	21A21a	16	40N	9E	5200

OLYMPIC PENINSULA

Dungeness River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Deer Park	23B4	1	2BN	5W	5200

Morse Creek

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Cox Valley	23B14	31	29N	6W	4500

Elwha River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Hurricane	23B3	36	29N	7W	4500

Skokomish River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Black and White	23B7	17	24N	5W	4200
Black and White Lakes	23B6	16	24N	5W	4700
Four Stream	23B10	1	23N	6W	3000
Home Sweet Home	23B5	2B	25N	5W	5200
Sundown Pass	23BB	25	24N	7W	3900

Soleduck River

NAME	NUMBER	SEC.	TWP.	RANGE	ELEV.
Deer Lake	23B1	14	2BN	9W	3900

LEGEND

NUMBERING SYSTEM EXAMPLE

21A7	SNOW COURSE ONLY
21A7a	AERIAL MARKER ONLY
21A7A	SNOW COURSE AND AERIAL MARKER
21A7M	SNOW COURSE AND SOIL MOISTURE STATION
21A7m	SOIL MOISTURE STATION
21A7P	SNOW COURSE AND PRECIPITATION STORAGE GAGE
21A7p	PRECIPITATION STORAGE GAGE
21A7SP	SNOW PILLOW

WATER SUPPLY OUTLOOK

State of Washington
February 1, 1976

It appears that adequate water will be available for all watersheds in the State of Washington during the forthcoming runoff season. The range of forecasts is from a high of 27 percent above normal in the Skagit Drainage to a low of 12 percent below normal in the Lewis River Drainage. The range of snow cover is considerably greater because in some areas only a few snow courses are measured and they, occurring at low elevations. The snow cover varies from a high of 36 percent above normal, again in the Skagit Drainage, to a low of 79 percent below normal for the Klickitat River Drainage. Subsequent winter precipitation will affect these watersheds immensely, but it is anticipated that, as previously stated, no water shortages should occur.

SNOW COVER

We have a large discrepancy in the snow pack, elevationwise, as of February 1. Excellent snowfalls occurred in late November and early December. At that time, the freezing level moved way up and rain occurred. This precipitation was very intense over a short period of time, with near records occurring at some high elevation precipitation stations. Stampede Pass received nearly sixteen inches of rainfall in a three day period. This precipitation passed through the snow pack at the higher elevations and increased the density immensely. At lower elevations, it washed the snow out of the mountains. This contributed to the damaging floods that occurred along the Cascade Range, on both sides. As it now stands, we do have good snow packs in the upper elevations, but very deficient snow cover at the low and medium low areas. The snow packs north of us, in British Columbia, are generally above normal at all elevations.

RESERVOIRS

The current storage in the major irrigation and power reservoirs in Washington is excellent for this time of year. Storage ranges from 8 percent below normal for the small irrigation reservoir, Conconully, to a high of 116 percent greater than normal for the Ross Reservoir in the Skagit Drainage. The five Yakima Reservoirs have 26 percent more water in storage, as of February 1, than normal. Franklin D. Roosevelt Reservoir has 36 percent more water than normal. As it now stands, all reservoirs will fill and spill with spring runoff.

PRECIPITATION

Rainfall during the fall was generally deficient, with above normal amounts occurring only in central Washington and on the northwestern slopes of the Cascades. Other drainage divisions, as reported by the National Weather Service, ranged from a low of 22 percent below normal for the Columbia in Canada to a 4 percent below on the southwestern slopes of the Cascades. Precipitation was above normal in the November-December period, but below normal during January. The resultant precipitation to date, for the winter period, ranges from 35 percent above normal in central Washington to 18 percent below normal in the northeastern portion of the state.

STREAMFLOW

During the month of January, all streams had well above normal outflows, as reported by the United States Geological Survey. Along the main stem of the Columbia, the flows at Birchbank were 32 percent greater than average; 39 percent above at Grand Coulee and 35 percent above at The Dalles. Tributary streams were also well above average with the Kettle flowing 41 percent above normal, the Okanogan, 34 percent; the Chelan, 58 percent and the Yakima, 65 percent above. Along the southern border of the state, the Walla Walla River had a flow 63 percent above normal and the Palouse, flowing from Idaho, 67 percent above. The outlets in southwestern Washington had a flow that was 33 percent above normal. Puget Sound Drainage watersheds indicated this continuing above normal flow with the Green having an outflow 47 percent greater than average and the Skagit 23 percent greater. Forecasts of streamflow are for near normal amounts of water, ranging from 12 percent below normal to 27 percent above. Numerical forecasts can be found on the following pages.

STREAMFLOW FORECASTS - FEBRUARY 1976

The following summarized runoff forecasts are based principally on mountain snow-cover and on the assumption that precipitation and temperature will be near average from the present time to the end of the forecast period. Appreciable deviations from normal of temperature and/or precipitation will correspondingly modify these forecasts. Streamflow figures for 1975 are preliminary and subject to revision.

Basin, Stream and Station	Forecast Runoff 1976	Seasonal Streamflow in Thousands of Acre-Feet % 15-Yr. Avg.	Forecast period	1975	1974	1973	15-Yr Average 58-72
		COLUMBIA BASIN					
COLUMBIA RIVER SYSTEM							
Columbia River at Birchbank 1/	46500	100	Apr-Sept	41188	54227	34796	46410
	36750	98	Apr-July	33033	44492	27876	37548
	27000	98	Apr-June	22534	31894	20203	27549
Columbia River at Grand Coulee 1/	71200	103	Apr-Sept	66512	85139	45849	69020
	60600	104	Apr-July	55890	73671	38193	58368
	47000	102	Apr-June	41354	57033	29886	46049
Columbia River bl Rock Island Dam 1/	78300	104	Apr-Sept	74143	96939	49117	75290
	65400	102	Apr-July	63212	84480	41200	64181
	51500	102	Apr-June	47192	65246	32032	50594
Columbia River at The Dalles, Or 1/	105200	101	Apr-Sept	109012	139724	65162	104600
	89000	99	Apr-July	94328	123570	54260	89875
	72400	99	Apr-June	73078	99282	43395	73143
PEND OREILLE RIVER SYSTEM							
Pend Oreille River bl Box Canyon	16500	103	Apr-Sept	17559	21551	8311	15950
	15000	102	Apr-July	15872	20103	7614	14677
	12700	99	Apr-June	12587	16732	6756	12767
KETTLE RIVER SYSTEM							
Kettle River nr. Laurier	2050	109	Apr-Sept	1921	2831	1121	1873
	1950	109	Apr-July	1837	2752	1093	1794
	1780	108	Apr-June	1641	2476	1020	1640

1/ Observed flow corrected for storage in any of the following reservoirs which are above the station: Kootenay Lake, Hungry Horse, Flathead Lake, Pend Oreille Lake, F. D. Roosevelt Lake, Lake Chelan, Coeur d'Alene Lake, Brownlee, Noxon Reservoir and pumpage at F. D. Roosevelt Lake.

Basin, Stream and Station	Forecast Runoff 1976	% 15-Yr Avg.	Forecast Period	Seasonal Streamflow in Thousands of Acre-Feet 1975	1974	1973	15-Yr Average 58-72
KETTLE RIVER SYSTEM (Cont.)							
Colville River	Not		Apr-Sept		286	54	148
at Kettle Falls	Forecast		Apr-July		269	50	137
	Feb 1		Apr-June		252	48	128
SPOKANE RIVER SYSTEM*							
Spokane River	2700	90	Apr-Sept	3088		1140	2982
at Post Falls, ID 2/	2600	90	Apr-July	2944		1082	2899
	2500	90	Apr-June	2736		1022	2773
OKANOGAN RIVER SYSTEM							
Similkameen River	1740	115	Apr-Sept	1409	2216	736	1516
nr. Nighthawk	1640	115	Apr-July	1315	2092	697	1424
	1430	117	Apr-June	1073	1710	621	1222
Okanogan River	2070	120	Apr-Sept	1584	2757	765	1723
nr. Tonasket	1880	119	Apr-July	1439	2534	707	1582
	1600	119	Apr-June	1178	2029	622	1349
METHOW RIVER SYSTEM							
Methow River	1240	120	Apr-Sept		1665	512	1031
nr. Pateros	1160	120	Apr-July		1555	476	963
	990	119	Apr-June		1268	417	832
CHELAN RIVER SYSTEM							
Chelan River	1430	114	Apr-Sept	1368	1749	777	1253
at Chelan 3/	1280	115	Apr-July	1216	1508	680	1112
	1020	116	Apr-June	856	1115	544	881
Stehekin River	975	108	Apr-Sept		1223	541	904
at Stehekin	840	108	Apr-July		996	447	776
	660	110	Apr-June		717	352	600
Entiat	Not		Apr-Sept		387	145	239
nr. Ardenvoir	Forecast		Apr-July		347	131	220
	Feb 1		Apr-June		256	113	180

* Forecasts made by Jack A. Wilson, Soil Conservation Service, Boise, Idaho

2/ Observed flow corrected for storage in Coeur d'Alene Lake and diversions by Spokane Valley Farms Company and Rathdrum Prairie Canals.

3/ Observed flow corrected for storage in Lake Chelan.

Basin, Stream and Station	Forecast Runoff 1976	% 15-Yr. Avg.	Forecast Period	1975	1974	1973	15-Yr. Average 58-72
	Seasonal Streamflow in Thousands of Acre-Feet						
WENATCHEE RIVER SYSTEM							
Wenatchee River	1500	115	Apr-Sept		1910	790	1312
at Plain	1370	115	Apr-July		1652	709	1187
	1100	115	Apr-June		1188	589	956
Wenatchee River	2090	117	Apr-Sept	2000	2556	1033	1786
at Peshastin	1890	116	Apr-July	1811	2232	938	1629
	1550	117	Apr-June	1332	1632	786	1324
Stemilt Basin nr. Wenatchee	130	94	May-Sept				138*
YAKIMA RIVER SYSTEM							
Yakima River	142	100	Apr-Sept	169	231	83	142
nr. Martin 4/	128	98	Apr-July	155	214	76	131
	118	102	Apr-June	128	170	70	116
Yakima River	1000	103	Apr-Sept		1463	555	968
at Cle Elum 5/	900	103	Apr-July		1335	489	877
	800	105	Apr-June		1067	433	764
Yakima River	1760	102	Apr-Sept			582	1730
nr. Parker 6/	1750	103	Apr-July			590	1701
	1630	103	Apr-June			598	1580
Kachess River	127	102	Apr-Sept	141	207	66	125
nr. Easton 7/	120	102	Apr-July	135	193	63	118
	109	103	Apr-June	112	156	59	106
Cle Elum River	526	110	Apr-Sept	545	745	285	477
nr. Roslyn 8/	477	109	Apr-July	497	664	255	437
	412	111	Apr-June	392	500	220	372

* Thousands of Miners' inches.

4/ Observed flow corrected for storage in Lake Keechelus.

5/ Observed flow corrected for storage in Keechelus, Kachess and Cle Elum Lakes and diversion by Kittitas Canal.

6/ Observed flow corrected for storage in Keechelus, Kachess, Cle Elum, Bumping and Rimrock Lakes and diversions by Roza, Union Gap, New Reservation, Old Reservation and Sunnyside Canals.

7/ Observed flow corrected for storage in Lake Kachess.

8/ Observed flow corrected for storage in Lake Cle Elum.

Basin, Stream and Station	Forecast Runoff 1976	% 15-Yr. Avg.	Forecast Period	Seasonal Streamflow in Thousands of Acre-Feet 1975	1974	1973	15-Yr. Average 58-72
YAKIMA RIVER SYSTEM (Cont.)							
Bumping River	144	99	Apr-Sept	179	230	74	146
nr. Nile 9/	133	99	Apr-July	163	206	68	134
	113	101	Apr-June	119	152	61	112
American River							
nr. Nile	125	97	Apr-Sept		203	70	128
	116	98	Apr-July		181	65	118
	100	100	Apr-June		137	58	100
Tieton River	245	99	Apr-Sept	297	405	160	247
at Tieton Dam 10/	210	100	Apr-July	252	337	124	211
	179	104	Apr-June	187	255	99	172
Naches River	900	101	Apr-Sept		1428	442	889
nr. Naches 11/	820	101	Apr-July		1286	385	810
	720	103	Apr-June		1038	336	698
Ahtanum Creek	50	104	Apr-Sept		83	21	48
nr. Tampico 12/	46	105	Apr-July		76	18	44
	41	105	Apr-June		64	16	39
LOWER COLUMBIA RIVER SYSTEM							
Mill Creek	32	119	Apr-Sept		57	17	27
nr. Walla Walla	28	117	Apr-July		51	13	24
	25	119	Apr-June		47	11	21
Lewis River	1180	88	Apr-Sept	1196	1951	800	1341
at Ariel 13/	1030	89	Apr-July	1028	1760	666	1151
	920	89	Apr-June	891	1489	574	1028
Cowlitz River	2080	99	Apr-Sept		3323	1252	2101
Blw. Mayfield Dam	1840	100	Apr-July		2975	1068	1846
	1610	102	Apr-June		2416	904	1578

9/ Observed flow corrected for storage in Bumping Lake.
10/ Observed flow corrected for storage in Rimrock Lake.
11/ Observed flow corrected for storage in Bumping and Rimrock Lakes and diversions by Tieton, Selah Valley, Wapatox Canals and City of Yakima.
12/ Observed flow of North and South Forks (Combined)
13/ Observed flow corrected for storage in Lake Merwin, Yale and Swift Reservoirs.
14/ Observed flow corrected for storage in Mayfield Reservoir.

Basin, Stream and Station	Forecast Runoff 1976	% 15-Yr. Avg.	Fore-cast Period	Seasonal Streamflow in Thousands of Acre-Feet 1975	1974	1973	15-Yr. Average 58-72
LOWER COLUMBIA RIVER SYSTEM (Cont.)							
Cowlitz River	2910	105	Apr-Sept	2652	4128	1676	2773
at Castle Rock 14/	2500	104	Apr-July	2279	3694	1419	2416
	2190	105	Apr-June	1817	3029	1212	2083
OLYMPIC PENINSULA							
DUNGENESS RIVER SYSTEM							
Dungeness River	161	98	Apr-Sept		205	120	165
nr. Sequim	134	98	Apr-July		162	98	137
	102	98	Apr-June		111	74	104
PUGET SOUND							
SKAGIT RIVER SYSTEM							
Skagit River at Newhalem	3070	127	Mar-Aug	2770	3169	1610	2418

14/ Observed flow corrected for storage in Mayfield Reservoir.

COMPARISON OF SNOW COVER WITH THAT OF PREVIOUS YEARS

The following tabulation of Washington stream basins presents the water content of the snow about February 1, 1976, as percent of the same date in 1975 and 1974 and average of record.

Tributary Basin	No. of Courses Average	1976 Snow Water Expressed as percent of 1975	1974	1958-72 Avg.
UPPER COLUMBIA BASIN				
Pend Oreille	8	62	67	66
Kettle	13	94	86	98
Colville	5	51	41	53
Spokane	4	81	75	91
Okanogan	30	93	82	107
Methow	10	94	61	92
Chelan	6	106	89	124
Entiat	11	110	85	102
Wenatchee	9	87	76	92
Yakima	23	75	61	86
Ahtanum	2	52	56	35
LOWER COLUMBIA				
Mill Creek	3	89	57	101
Klickitat	1	21	15	21
White Salmon	2	79	44	68
Lewis	18	84	50	60
Cowlitz	10	80	58	79
PUGET SOUND				
Nisqually	4	86	65	104
White	2	84	71	98
Green	7	63	53	92
Snoqualmie	1	-	50	99
Skykomish	2	94	89	108
Skagit	12	107	77	136
Baker	8	100	66	115
Nooksack	1	94	78	-
OLYMPIC PENINSULA				
Skokomish	4	87	52	66
Elwha	2	84	62	74

RESERVOIR STORAGE - 1000 Acre Feet

BASIN OR STREAM	RESERVOIR	USABLE 1/ CAPACITY	Measured (Februar 1976	1975	1974	Normal*
		COLUMBIA				
Spokane	Coeur d'Alene Lake	225.1	169.1	63.8	386.0	138.4
Columbia	Franklin D. Roosevelt Lake	5232.0	5116.0	4844.6	730.6	3766.0
Columbia	Banks Lake	761.8	712.2	714.9	720.3	566.9
Okanogan	Conconully Reservoir	13.0	10.0	10.6	5.6	10.8
Okanogan	Salmon Lake	10.5	9.8	9.2	7.3	7.6
Chelan	Lake Chelan	676.1	513.5	242.9	297.7	295.9
		YAKIMA				
Yakima	Keechelus Lake	157.8	118.3	127.8	87.3	96.1
Kachess	Kachess Lake	239.0	206.8	142.4	93.6	175.7
Cle Elum	Lake Cle Elum	436.9	308.4	338.2	168.7	232.9
Bumping	Bumping Lake	33.7	11.4	5.3	10.8	8.3
Tieton	Rimrock Lake	198.0	140.0	136.3	112.0	110.6
		PUGET SOUND				
Skagit	Ross Reservoir	1404.1	1258.7	1094.5	1231.4	582.1
Skagit	Diablo Reservoir	90.6	88.0	84.9	85.2	84.4
Skagit	Gorge Reservoir	9.8	8.3	8.2	7.6	--

1/ Based on Active Storage

* 15-year Average 1958-72

SOIL MOISTURE - FEBRUARY

Drainage Basin and Station	Number	Elev.	Profile Depth	Inches Total Capacity	Soil Moisture Content Inches as of Feb. 1 1976	1975	1974
OKANOGAN							
Salmon Meadows	19A2M	4500	48	5.4	3.6	2.0	3.7
Trout Creek	3-M	3600	48	7.3	4.0*	3.2	3.0
YAKIMA							
Domery Flat	21B20m	2200	48	6.9	-	-	5.0
Lake Cle Elum	21B14M	2200	48	12.8	-	-	9.2
WALLA WALLA							
Couse	17C3m	3650	48	11.1	N/A	10.2	10.1
Helmers	17C2M	4400	48	12.0	N/A	8.8	9.8
WENATCHEE							
Upper Wheeler	20B7M	4400	48	12.7	11.6	8.6	11.3

* January 1, measurement
N/A Not Available

FALL SOIL MOISTURE

Drainage Basin and Station	Number	Elev.	Profile Depth	Inches Total Capacity	Soil Moisture Content Inches as of Oct. 1 1975	1974	1973
OKANOGAN							
Salmon Meadows	19A02M	4500	48	5.4	3.2	1.8	2.6
Trout Creek	3-M	3600	48	7.3	3.1	3.0	2.8
YAKIMA							
Domery Flat	21B20m	2200	48	6.9	-	-	2.6
Lake Cle Elum	21B14M	2200	48	12.8	-	-	6.1
WALLA WALLA							
Couse	17C3m	3650	48	11.1	7.3	-	5.6
Helmers	17C2M	4400	48	12.0	6.5	-	7.6
WENATCHEE							
Upper Wheeler	20B7M	4400	48	12.7	8.6	5.4	6.0

PRECIPITATION 1/

Division Average Observations and Departures

Drainage Divisions	FALL Sept-Oct Observed	FALL 1975 2/ Departure	WINTER Nov-Dec 1975 Observed	WINTER Jan 1976 2/ Departure
Columbia in Canada	3.51	+0.96	9.62	+0.41
Pend Oreille - Spokane	4.27	-0.21	11.64	-1.29
Northeastern Washington	2.29	-0.49	6.46	-1.43
Southeastern Washington	2.94	-0.29	8.74	-0.23
Central Washington	5.47	+0.72	26.97	+6.94
North Central Washington	1.22	-0.40	4.91	-0.01
Northwest Slope Cascades	15.42	+2.73	47.39	+11.57
Southwest Slope Cascades	8.34	-0.34	33.26	+4.35

Northeastern Washington	- Lower Spokane, Colville, Sanpoil and Lower Kettle drainages.
Southeastern Washington	- Touchet, Tucannon and Palouse drainages.
Central Washington	- Yakima, Wenatchee and Chelan drainages.
North Central Washington	- Methow and Okanogan drainages.
Northwest Slope Cascades	- Puget Sound drainages.
Southwest Slope Cascades	- Lower Columbia drainages.

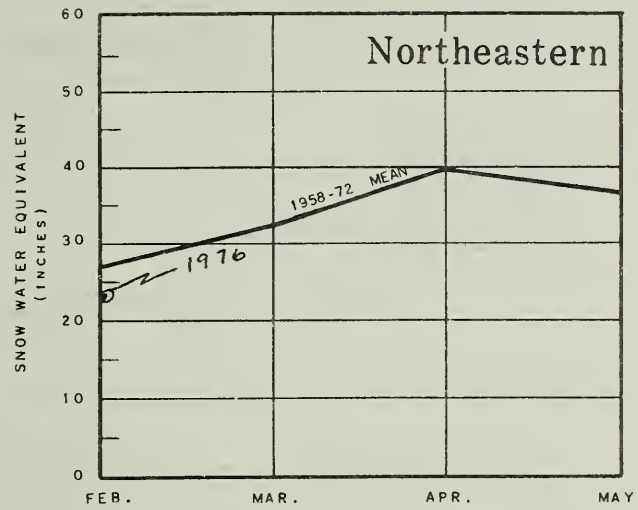
1/ - Preliminary analysis by National Weather Service from data furnished by Meteorlogical Services of Canada and the National Weather Service.

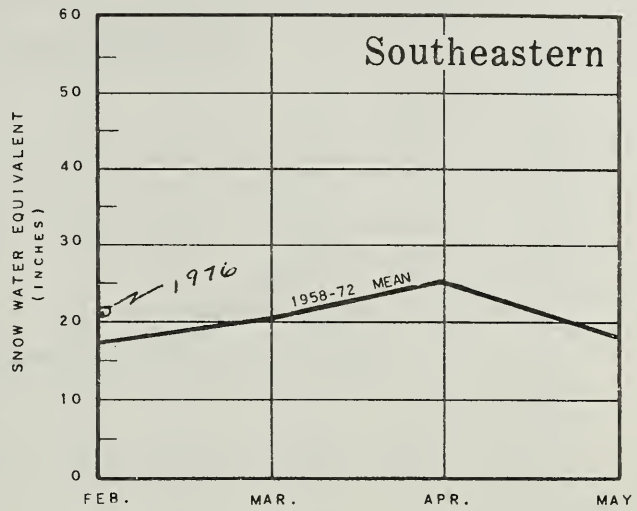
2/ - Departure from 15-year (1958-72) drainage division average.

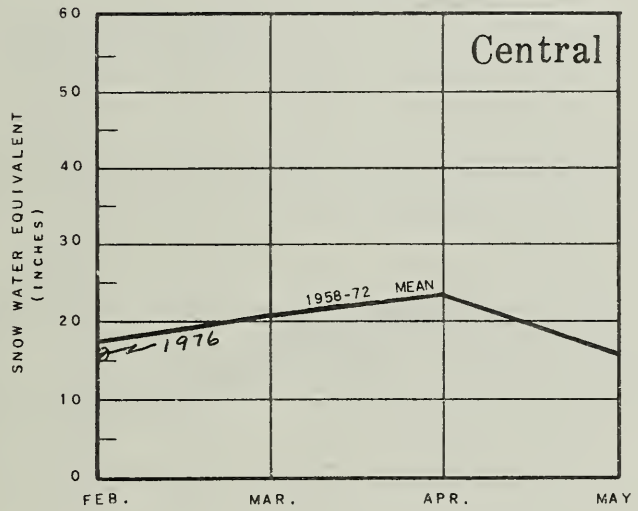
WASHINGTON SNOW COVER

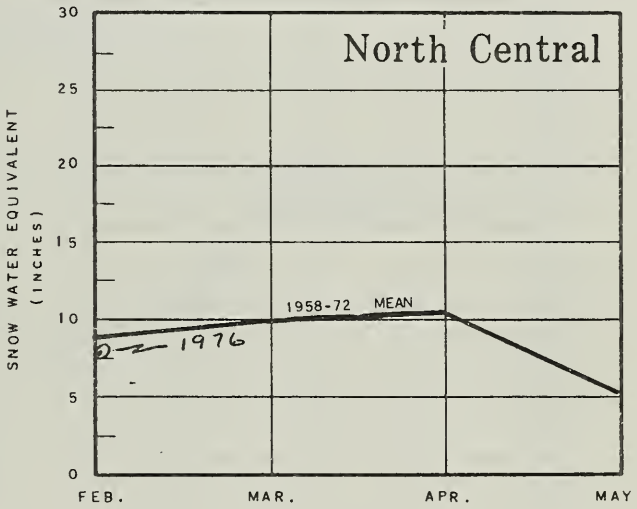
1976

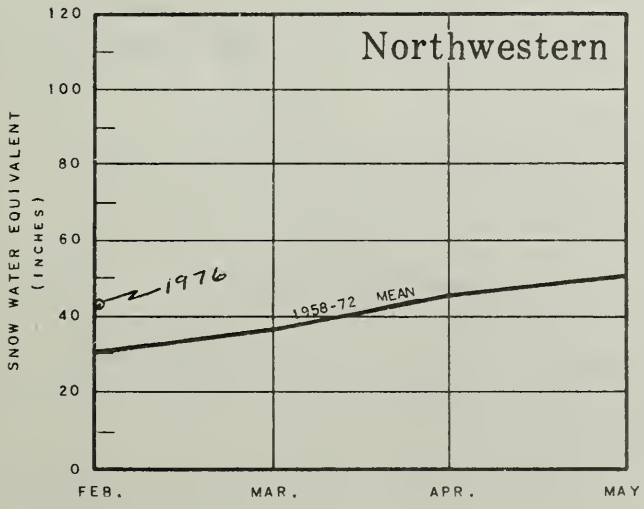
DRAINAGE AREAS

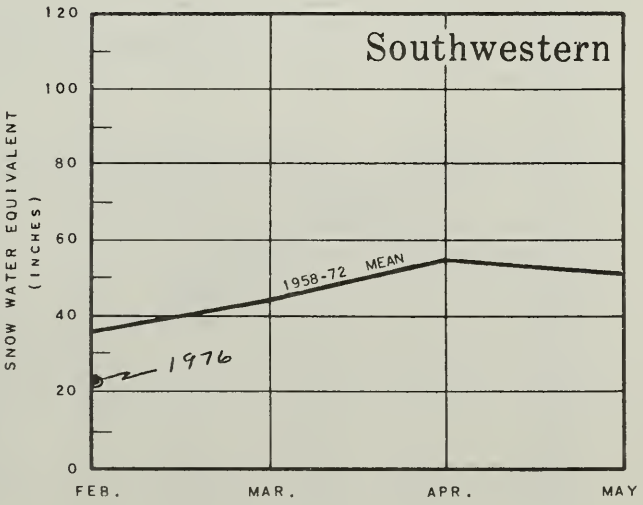








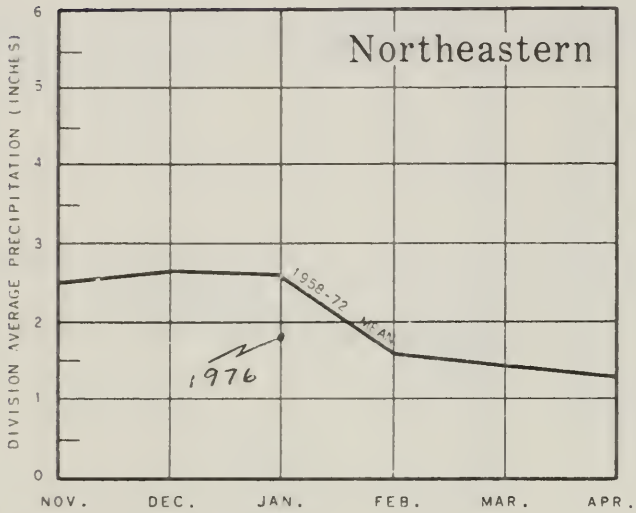


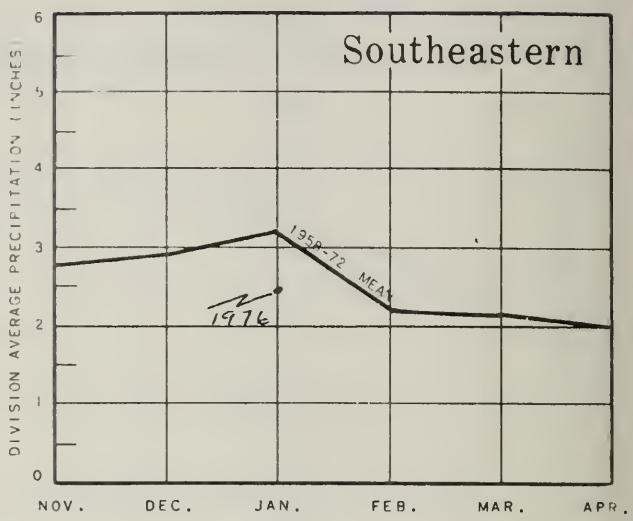


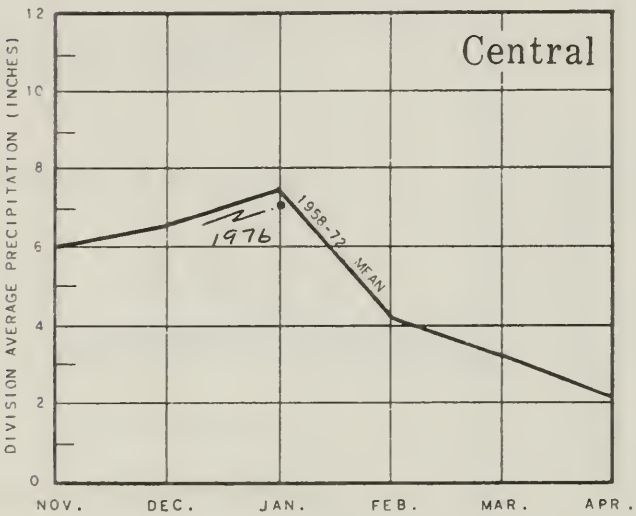
WASHINGTON VALLEY PRECIPITATION

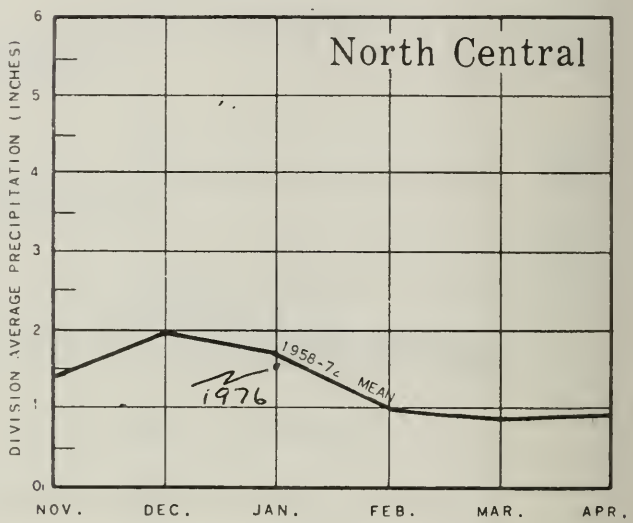
1976

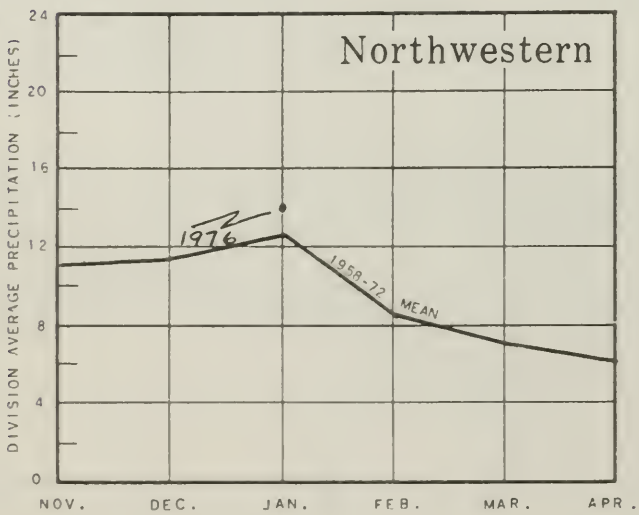
DRAINAGE AREAS

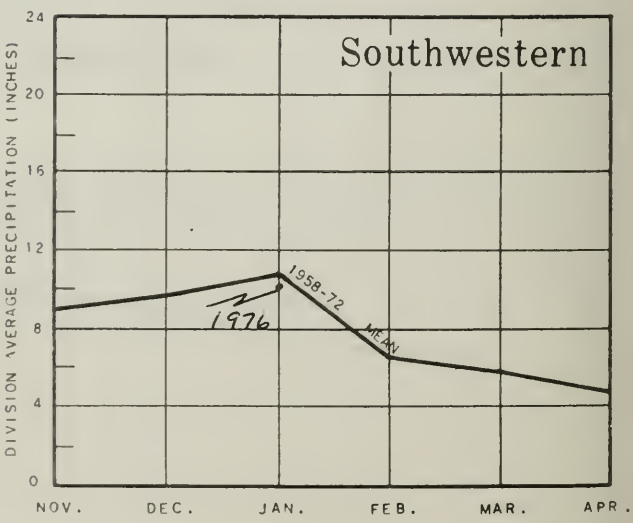






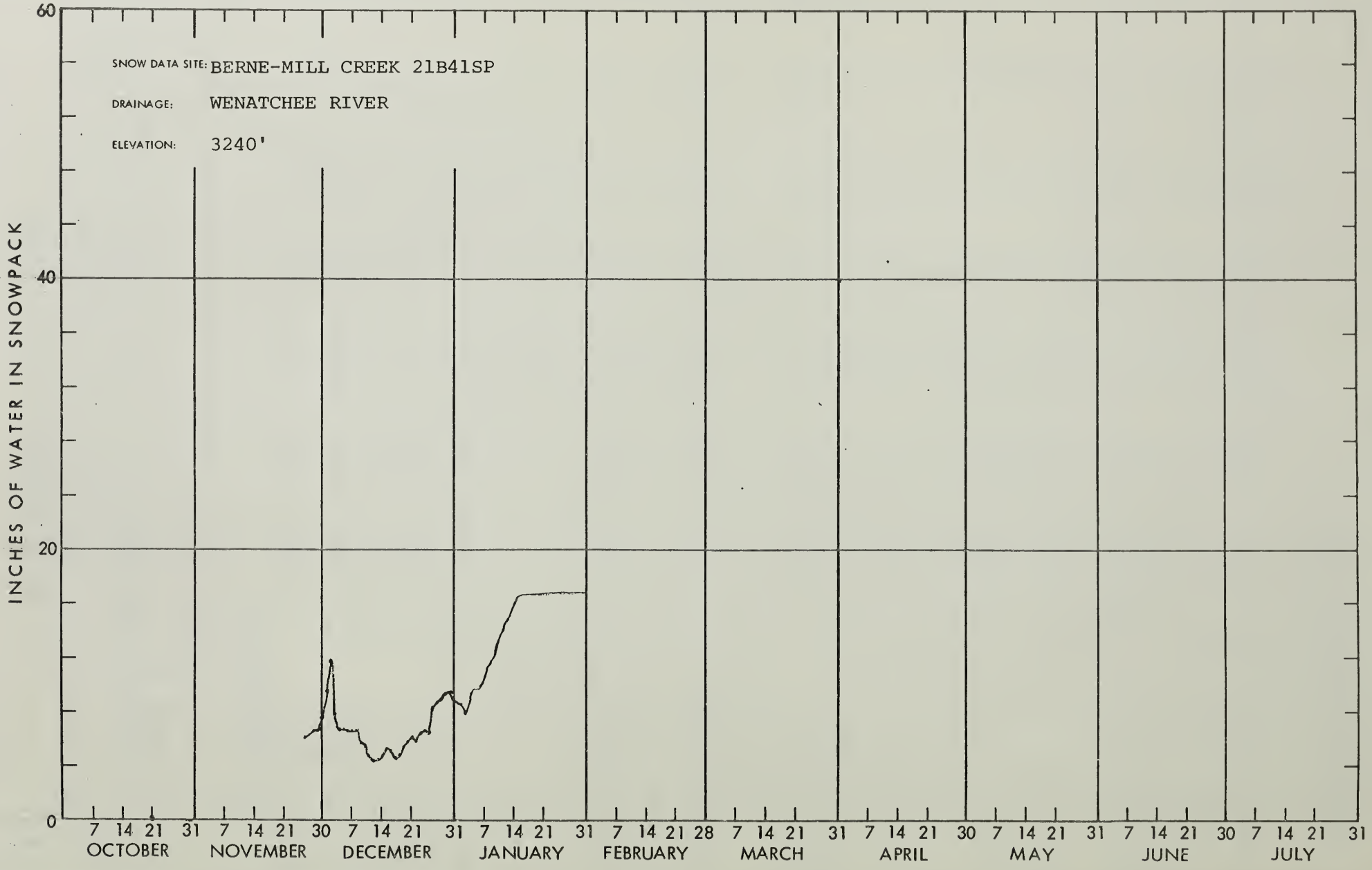






Preliminary Analysis by National Weather Service

WSFB-X13C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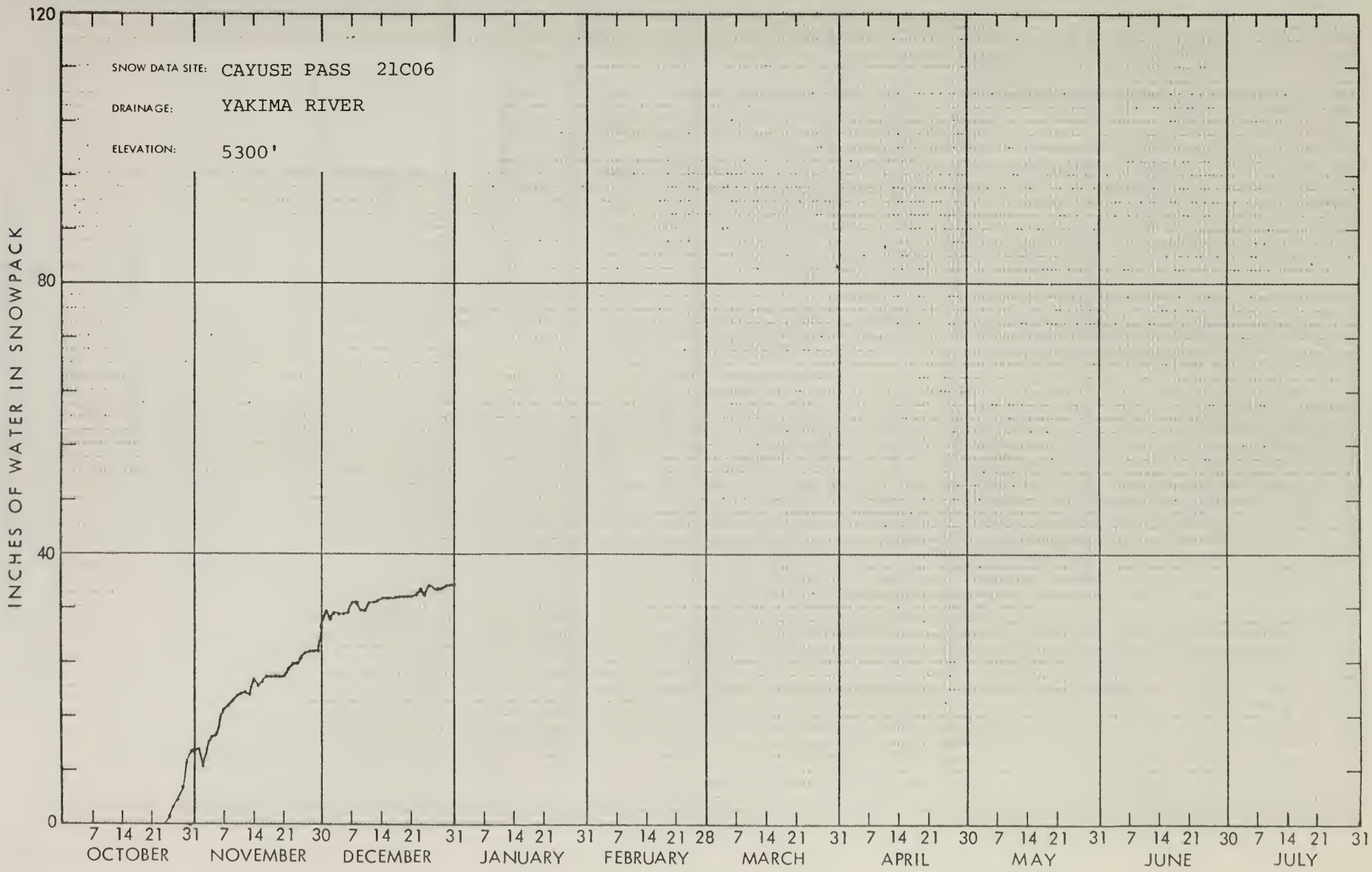
DRAINAGE: WENATCHEE RIVER
ELEVATION: 3240'
INCHES OF WATER IN SNOWPACK
60
40
20
0
7 14 21 31 7 14 21 30 7 14 21 31 7 14 21 31 7 14 21 28 7 14 21 31 7 14 21 30 7 14 21 31 7 14 21 30 7 14 21 31
OCTOBER
NOVEMBER
DECEMBER
JANUARY
FEBRUARY
MARCH
APRIL
MAY
JUNE
JULY

WSFB-X13D


SNOW DATA SITE: CAYUSE PASS 21C06
DRAINAGE: YAKIMA RIVER
ELEVATION: 5300'
INCHES OF WATER IN SNOWPACK
120
80
40
0
7 14 21 31 7 14 21 30 7 14 21 31 7 14 21 31 7 14 21 28 7 14 21 31 7 14 21 30 7 14 21 31 7 14 21 30 7 14 21 31
OCTOBER
NOVEMBER
DECEMBER
JANUARY
FEBRUARY
MARCH
APRIL
MAY
JUNE
JULY

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 1

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
UPPER COLUMBIA DRAINAGE							
PEND OREILLE RIVER							
Benton Meadow	16A02	2344	12/29	Trace	0.0	1.9	3.5
			1/27	13	3.4	5.3	6.0
Benton Spring	16A03	4900	12/29	10	2.6	9.3	8.4
			1/30	21	6.2	14.8	13.8
Chewelah	17A04	4925	1/31	25	7.2	11.7	13.0
Lookout	15B02	5250	12/29	45	11.8	13.6	15.6
			1/30	71	23.4	26.0	26.7
Nelson	19-Can	3050	10/30	12	2.1	-	-
			11/13	7.1	1.4	1.6	-
			11/27	15	2.4	2.8	-
			12/12	11	2.5	3.6	-
			12/30	22	4.5	7.7	7.4*
			2/1	33	8.8	13.0	11.3*
Schweitzer Bowl	16A06	4500	12/30	33	8.8	16.6	-
			2/2	43	14.9	27.1	22.6
Schweitzer Ridge	16A05	6100	12/30	52	19.2	30.2	-
			2/2	70	27.5	43.2	32.1
Winchester Creek	17A03	2970	1/29	17	4.9	8.4	9.7
KETTLE RIVER							
Barnes Creek	90-Can	5300	2/1	58	15.5	15.9	14.1*
Big White Mtn.	154-Can	5500	1/29	59	18.4	17.8	13.8*
Boulder Road	18A02	1450	12/29	11	2.5	2.4	2.7
			1/29	15	1.6	4.1	4.6
Butte Creek	18A03	4070	12/29	18	2.6	4.8	4.7
			1/29	23	6.2	7.8	7.4
Cabin Creek	18A08	3170	12/29	18	3.2	4.4	4.4
			1/29	22	5.7	6.8	6.5
Carmi	126-Can	4100	1/29	23	6.0	7.7	5.3*
Farron # 1	17-Can	4000	1/29	33	9.4	9.9	9.6*
Farron # 2	243-Can	4000	1/29	32	9.0	9.8	New
Goat Creek	18A04	3595	12/29	15	2.5	3.9	4.1
			1/29	18	4.8	5.9	6.2
Monashee Pass	48A-Can	4500	2/1	42	11.4	11.0	9.6*
Old Glory Mountain	42-Can	7000	1/31	64	14.5	25.5	19.0*
Snow Caps Creek	18A05	2150	12/29	12	2.1	2.2	3.0
			1/29	15	4.0	2.1	4.8
Snow Caps Trail	18A06	2720	12/29	16	2.1	3.2	3.5
			1/29	19	4.9	4.6	5.5
Summit G. S.	18A07	4600	12/29	15	1.8	4.5	3.8
			1/29	18	4.8	7.2	5.9

Average based on 1958-72 average

* Average for years of record

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 2

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
KETTLE RIVER (cont.)							
Trapping Creek Lower	166-Can	3050	1/29	23	6.1	6.5	4.4*
Trapping Creek Upper	165-Can	4450	1/29	39	9.2	9.8	7.4*
COLVILLE RIVER							
Baird	17A06	3215	1/30	15	3.8	6.6	6.1
Carlson	18A09	2885	1/31	9	2.6	5.6	4.5
Chewelah	17A04	4925	1/31	25	7.2	11.7	13.0
Stranger Mountain	17A05	4990	1/31	15	4.0	10.4	11.0
Togo	18A10	3370	1/31	20	5.6	11.1	10.1
SPOKANE RIVER							
Above Burke	15B08	4100	12/29	29	8.4	9.7	-
			1/30	54	16.1	16.2	-
Fourth of July Summit	16B03	3100	12/29	Trace	0.0	4.3	-
			1/29	17	5.4	9.8	6.8
Lookout	15B02	5250	12/29	45	11.8	13.6	15.6
			1/30	71	23.4	27.2	26.4
Mosquito Ridge	16A04	5110	1/27	65	22.3	-	-
Sherwin	16C01	3200	12/31	26	7.9	5.6	-
			1/30	38	11.6	14.4	11.0
OKANOGAN RIVER							
Aberdeen Lake	6A-Can	4300	2/2	22	5.9	6.5	5.0*
Blackwall Peak	100-Can	6250	12/30	78	28.9	17.3	14.7*
			1/26	92	33.8	27.5	25.3*
Brenda Mine	193-Can	4800	12/29	36	8.0	8.0	-
			1/28	44	12.7	13.0	9.9*
Brookmere	27-Can	3200	1/30	19	5.6	7.1	7.2*
Carrs Landing Upper	168-Can	3200	12/28	17	2.5	3.2	-
			1/29	18	3.8	6.6	3.8*
Clark +	19A8a	7000	1/30	38	12.5	16.8	-
Dollar Watch +	20A29a	7000	1/30	46	15.2	21.6	19.4
Enderby	130-Can	6250	2/2	88	30.2	31.5	25.0*
Freezeout Meadows New	20A38	5000	1/26	83	28.3	24.7	New
Hamilton Hill	107-Can	4900	1/29	49	14.9	12.3	10.4*
Harts Pass	20A05A	6500	1/28	122	43.7	36.1	32.7
Horseshoe Basin +	19A05a	7000	1/30	50	16.5	12.9	9.7
Isontok Lake	152-Can	5510	12/30	23	4.4	4.5	4.0*
			1/30	28	7.2	8.2	6.2*
Lost Horse Mtn.	105-Can	6300	1/30	33	10.2	7.8	6.7*
Loup Loup	19A07	4650	1/29	16	4.7	6.8	7.6

\# Average based on 1958-72 average
* Average for years of record
\+ Snow water equivalent estimated from aerial stadia observation

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 3

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
OKANOGAN RIVER (Cont.)							
McCulloch	4-Can	4200	12/30	20	3.2	4.4	3.2*
			1/27	27	6.6	7.4	4.8*
Missezula Mtn.	106-Can	5100	1/28	30	7.7	9.0	6.5*
Mission Creek	5A-Can	6000	12/29	38	9.3	10.9	8.9*
			1/28	54	15.4	17.0	13.6*
Monashee Pass	48A-Can	4500	2/1	42	11.4	11.0	9.6*
Mount Kobau	156-Can	5950	1/30	27	7.3	8.4	10.6*
Muckamuck +	19A09a	6390	1/30	40	13.2	11.2	-
Mutton Creek No. 1	19A01	5700	1/29	24	8.3	10.3	10.4
Mutton Creek No. 2	19A04	6000	1/29	31	9.2	9.0	10.9
Mutton Creek No. 2 SP	19A11SP	6000	1/29	-	6.9	7.0	New
New Penticton Res. # 2	183-Can	5225	1/30	30	7.7	8.9	7.5*
Oyama Lake	203-Can	4400	1/31	21	5.4	6.3	5.5*
Paysayten +	20A28a	4300	1/30	47	15.5	15.0	13.0
Postill Lake	55-Can	4500	1/30	24	6.6	8.2	5.9*
Rusty Creek	19A03	4000	1/28	12	3.1	5.0	5.9
Salmon Meadows	19A02	4500	1/28	19	5.6	6.5	7.8
Silver Star Mountain	99-Can	6050	12/31	68	18.0	18.0	14.2*
			2/1	68	25.1	26.1	19.1*
Starvation Mountain +	19A10a	6750	1/30	44	14.5	12.9	-
Summerland Reservoir	3A-Can	4200	1/1	28	6.0	6.5	4.6*
			2/1	31	9.2	10.9	7.7*
Touts Coulee	19A06	2845	1/28	11	1.6	1.6	3.4
Trout Creek	3-Can	4700	1/29	31	8.3	8.5	5.2*
Vaseux Creek	233-Can	4600	1/1	17	2.6	2.9	-
			1/31	21	4.7	6.0	5.5*
White Rocks Mtn.	70-Can	6000	1/29	56	18.7	24.0	18.5*
METHOW RIVER							
Billy Goat Pass +	21A10a	6409	1/30	58	19.1	18.9	20.8
Dollar Watch +	20A29a	7000	1/30	46	15.2	21.6	19.4
Harts Pass	20A05A	6500	1/28	122	43.7	36.1	32.7
Horseshoe Basin +	19A05A	7000	1/30	50	16.5	12.9	9.7
Loup Loup	19A07	4650	1/29	16	4.7	6.8	7.6
Mutton Creek No. 1	19A01	5700	1/29	24	8.3	10.3	10.4
Mutton Creek No. 2	19A04	6000	1/29	31	9.2	9.0	10.9
Rusty Creek	19A03	4000	1/28	12	3.1	5.0	5.9
Salmon Meadows	19A02	4500	1/28	19	5.6	6.5	7.8
War Creek Pass +	20A31a	6500	1/30	126	41.6	35.1	-

\# Average based on 1958-72 average
* Average for years of record
\+ Snow water equivalent estimated from aerial stadia observation

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 4

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE						Water Content (inches)	
NAME	Number	Elevation	Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Last Year	Average #
CHELAN LAKE BASIN							
Cloudy Pass +	20A22a	6500	1/30	119	39.3	40.6	29.0
Little Meadows +	20A24a	5275	1/30	116	38.3	34.3	32.2
Lyman Lake +	20A23A	5900	1/30	152	50.2	-	42.1
Park Creek Flat +	20A13a	2220	1/30	98	32.3	-	27.3
Park Creek Ridge	20A12A	4600	1/30	126	41.6	43.8	34.1
Rainy Pass	20A09	4780	1/28	117	38.7	35.6	29.5
War Creek Pass +	20A31a	6500	1/30	126	41.6	35.1	-
ENTIAT RIVER							
Blue Creek G. S. +	20B28a	5425	1/27	110	39.9	35.6	-
Brief	20B19	1600	1/28	23	7.5	6.1	6.8
Entiat Meadows +	20A33a	4800	1/27	118	42.8	39.6	-
Entiat River Trail +	20A34a	3150	1/27	62	19.4	17.2	-
Four Mile Ridge +	20B27a	7000	1/27	88	31.9	27.7	-
Fox Camp +	20A36a	6510	1/27	156	56.6	42.2	-
Pope Ridge	20B20	4300	1/29	42	13.0	16.5	14.0
Pugh Ridge	20A32a	6400	1/27	98	35.6	26.1	-
Shady Pass	20A37	6200	1/30	79	28.8	25.2	-
Snow Brushy +	20A35a	3850	1/27	77	24.1	28.7	-
Tommy Creek +	20B21a	5300	1/27	56	20.3	21.1	-
WENATCHEE RIVER							
Berne-Mill Creek	21B23	3170	11/23	26	8.0	5.4	4.1
			12/15	32	9.3	8.2	7.6
			12/30	40	11.0	15.3	11.2
			1/31	61	19.7	27.4	21.4
Berne-Mill Creek New	21B41SP	3240	11/26	17	6.0	5.2	-
			12/30	24	7.6	14.7	9.9
			1/31	41	16.0	23.2	18.7
Blewett Pass No. 2	20B02	4270	12/29	16	4.6	8.1	6.7
			1/29	28	10.1	15.6	13.0
Chiwaukum G. S.	20B16	1810	11/26	11	1.6	-	1.5
			12/15	17	4.6	2.5	3.2
			12/30	23	5.2	3.9	5.1
			1/14	51	7.9	8.7	7.8
			1/31	35	9.0	8.9	9.9
Lake Wenatchee	20B05	1970	11/26	18	3.6	0.6	1.5
			12/15	19	6.0	2.6	3.9
			12/30	32	8.4	5.4	6.1
			1/14	64	14.6	12.1	9.6
			1/31	44	13.1	13.0	12.1

Average based on 1958-72 average
+ Snow water equivalent estimated from aerial stadia observation

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 5

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
WENATCHEE RIVER (Cont.)							
Leavenworth R. S.	20B17	1127	10/31	0	0.0	0.0	0.0
			11/28	1.9	0.6	0.0	0.8
			12/15	2.0	0.8	1.0	1.8
			12/30	5.4	2.0	0.6	3.4
			1/15	20	5.8	5.8	4.7
			1/28	12	6.0	4.9	6.0
Lyman Lake	20A23A	5900	1/30	152	50.2	-	42.1
Merritt	20B18	2140	11/26	19	4.0	1.9	2.3
			12/15	17	6.0	3.8	4.9
			12/30	19	4.6	7.7	7.9
			1/14	62	11.4	15.8	11.7
			1/31	36	11.2	17.2	14.5
Stevens Pass	21B01	4070	11/13	45	9.9	2.4	3.6
			11/26	43	13.0	9.2	8.9
			12/15	56	20.0	15.1	14.7
			12/30	71	25.3	29.4	21.7
			1/14	127	40.3	41.9	29.0
			1/31	98	39.8	46.0	37.0
Stevens Pass Sand Shed	21B45	3700	11/26	29	9.2	6.0	-
			12/15	39	13.4	9.9	-
			12/30	52	16.6	18.2	-
			1/14	98	28.0	29.3	-
			1/31	70	30.0	29.5	-
COLOCKUM CREEK							
Colockum Creek Upper	20B22	5300	1/27	8	3.2	15.2	-
Colockum Creek Lower	20B23	4300	1/27	13	3.2	7.5	-
SQUILCHUCK CREEK							
Beehive Springs	20B03	4400	1/26	6	1.7	6.2	6.6
Scout-A-Vista	20B04	3400	1/26	16	4.2	7.0	6.5
STEMILT CREEK							
Jump-Off	20B08	4450	1/26	12	3.4	7.4	6.7
Stemilt Slide	20B06	5000	1/26	29	8.6	11.0	12.4
Upper Wheeler	20B07	4400	1/26	8	3.1	8.6	8.3

Average based on 1958-72 average

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 6

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
YAKIMA RIVER							
Ahtanum R. S.	21C11	3100	12/31	3.4	1.0	2.6	3.1
			1/27	8.0	2.2	6.8	6.3
Blewett Pass No. 2	20B02	4270	12/29	16	4.6	8.1	6.7
			1/29	28	10.1	15.6	13.0
Bumping Lake Old	21C08	3450	12/18	9.0	2.3	3.4	4.0
			12/31	14	3.7	5.9	7.1
			1/18	31	7.6	11.9	10.4
			1/31	28	8.7	13.1	13.2
Bumping Lake New	21C36	3400	12/18	16	4.8	5.2	5.8
			12/31	21	5.6	8.7	8.7
			1/18	44	12.0	15.2	13.0
			1/31	38	12.7	18.2	18.3
Cayuse Pass	21C06	5300	1/1	90	35.0	37.8	33.2
			1/28	143	61.2	60.5	58.7
Colockum Pass	20B09	5370	1/28	31	10.9	13.6	11.2
Cooke Creek	20B10	4123	1/28	0	0.0	6.2	7.2
Corral Pass	21B13	6000	1/30	80	30.4	-	-
Grouse Camp	20B11	5385	1/26	30	9.9	13.8	12.1
High Creek	20B12	2930	1/26	21	5.7	5.9	4.9
Joe Lake +	21B46a	4624	1/23	147	58.8	45.0	-
Green Lake	21C10	6000	1/27	61	23.0	31.8	-
Lake Cle Elum	21B14M	2200	10/31	0	0.0	0.0	-
			11/13	3.0	0.4	0.0	-
			11/26	0	0.0	0.6	1.1
			12/16	4.0	1.3	0.8	2.2
			1/5	20	4.8	4.6	4.2
			1/16	30	10.4	10.6	6.5
			1/30	24	8.3	10.3	8.2
Lemah Creek +	21B47a	3327	1/23	84	33.6	32.6	-
Manashtash	20C01	3935	1/27	0	0.0	4.9	3.9
Morse Lake	21C17	5400	1/28	97	36.7	55.6	39.4
Nanum	20B13	3875	1/26	20	6.2	9.8	7.8
Olallie Meadows	21B02	3625	1/30	79	32.5	-	32.7
Satus Pass	20D01	4030	1/30	7.0	1.8	8.6	8.7
Stampede Pass SP	21B10	3860	12/4	-	12.7	8.8	6.3
			12/16	-	17.0	15.1	11.9
			1/1	-	23.2	-	16.5
			1/18	-	38.5	44.1	22.0
			1/29	-	38.4	46.8	28.7
Trail Creek	20B14	3360	1/28	0	0.0	3.8	2.3
Tunnel Avenue	21B08	2450	10/31	0	0.0	0.0	-
			11/14	10	2.2	0.0	0.0
			11/28	12	3.0	3.0	2.7
			12/16	16	4.6	5.8	6.4
			12/31	24	6.2	10.6	9.2
			1/15	63	16.5	24.3	11.3
			1/29	46	15.7	23.9	17.6

Average based on 1958-72 average

+ Snow water equivalent estimated from aerial stadia observation

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 7

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
YAKIMA RIVER (Cont.)							
Van Epps Pass +	20B26a	5925	1/23	104	41.6	38.1	-
Walters Flat	20B15	3360	1/26	16	5.4	7.2	6.3
Waptus Lake +	21B49a	3024	1/23	84	33.6	36.6	-
White Pass (E. Side)	21C28	4500	12/18	17	4.8	5.5	6.3
			12/31	23	6.6	9.6	9.6
			1/15	54	14.0	18.9	14.0
			1/29	40	12.7	20.9	18.2
White Pass (L. Lake)	21C27	4500	12/30	18	5.7	12.9	11.8
			1/27	41	13.9	23.4	22.0
AHTANUM CREEK							
Ahtanum R. S.	21C11	3100	12/31	3.4	1.0	2.6	3.1
			1/27	8.0	2.2	6.8	6.3
Green Lake	21C10	6000	1/27	61	23.0	31.8	-
LOWER COLUMBIA DRAINAGE							
ASOTIN CREEK							
Spruce Springs	17C04	5700	1/29	51	18.8	20.1	19.3
MILL CREEK							
Homestead	17C01	4030	1/27	17	5.9	7.1	6.5
Martin Springs	17C02	4400	1/27	30	9.8	11.2	9.8
Tollgate	18D3M	5070	1/28	61	20.7	19.6	16.7
KLICKITAT RIVER							
Satus Pass	20D01	4030	1/30	7.0	1.8	8.6	8.7
WHITE SALMON RIVER							
Cultus Creek	21C12	4000	12/27	36	12.9	14.7	17.8
			1/28	66	23.3	27.1	32.5
Surprise Lakes	21C13A	4250	12/27	33	12.3	16.5	20.1
			1/28	62	23.5	32.7	35.9
WIND RIVER							
Old Man Pass	21D19	3100	12/27	3.9	0.9	3.0	7.5
			1/28	21	6.0	9.9	14.7

Average based on 1958-72 average

+ Snow water equivalent estimated from aerial stadia observation

USDA-SCS-PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 8

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
LEWIS RIVER							
Blue Lake +	21C22a	4800	12/31	82	28.7	27.9	34.5
			1/26	140	53.2	51.1	60.5
Bob's Trail	21C21	2200	12/31	9.4	2.0	2.9	6.5
			1/26	25	7.4	9.6	12.0
Calamity Ridge +	22D01a	2500	12/31	8.0	1.6	2.5	3.9
			1/26	4.0	1.4	4.0	5.6
Council Pass +	21C18	4200	12/27	30	11.1	18.6	18.6
			1/26	69	26.2	26.6	29.7
Cultus Creek	21C12	4000	12/27	36	12.9	14.7	17.8
			1/28	66	23.3	27.1	32.5
Divide Meadow	21C29a	5600	12/27	60	22.8	24.2	27.5
			1/26	108	41.0	43.2	42.3
Grand Meadow	21C25	3500	12/31	21	6.1	8.2	10.5
			1/28	40	13.9	17.4	19.4
Lone Pine Shelter	21C26	3800	12/30	42	13.8	11.6	17.0
			1/29	63	23.2	23.4	30.5
Marble Mountain +	22C05a	3200	12/27	2.0	0.7	2.2	12.7
			1/26	23	9.2	8.7	28.7
Mosquito Meadows	21C19	4100	12/30	42	14.6	12.7	18.9
			1/29	66	25.1	24.7	32.1
New Muddy River	22C06	2000	12/27	3.1	1.0	1.1	6.4
			1/26	14	4.4	4.0	12.1
Old Man Pass	21D19	3100	12/27	3.9	0.9	3.0	7.5
			1/28	21	6.0	9.9	14.7
Plains of Abraham +	22C01a	4400	12/31	58	20.3	21.8	28.8
			1/26	75	30.0	31.1	45.2
Smith Creek Road	22C04	2100	12/31	6.9	0.8	2.2	9.5
			1/26	18	6.3	8.6	15.7
Spencer Meadow +	21C20a	3400	12/31	10	2.9	4.5	10.2
			1/26	24	7.9	11.2	17.9
Surprise Lakes	21C13A	4250	12/27	33	12.3	16.5	20.1
			1/28	62	23.5	32.7	35.9
Table Mountain +	21C24a	4200	12/27	36	13.3	18.6	21.4
			1/26	82	28.7	30.2	34.8
Timbered Peak +	21D18a	3000	12/31	10	2.2	3.1	8.0
			1/26	10	3.3	6.8	14.3
COWLITZ RIVER							
Cayuse Pass	21C06	5300	1/1	90	35.0	37.8	41.3
			1/28	143	61.2	60.5	58.7
Mosquito Meadows	21C19	4100	12/30	42	14.6	12.7	18.9
			1/29	66	25.1	24.7	32.1
Ohanapecosh	21C32	2200	12/30	7.4	2.1	6.8	4.9
			1/28	29	9.9	15.2	14.4

Average based on 1958-72 average

\+ Snow water equivalent estimated from aerial stadia observation

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 9

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
COWLITZ RIVER (Cont.)							
Packwood Lake	21C31	2870	1/1	8.0	2.0	4.0	4.7
			1/28	22	7.8	10.6	10.6
Pigtail Peak	21C33	5900	12/30	88	31.3	26.8	26.1
			1/27	126	47.7	29.5	46.7
Plains of Abraham +	22C01a	4400	12/31	58	20.3	21.8	28.8
			1/26	75	30.0	31.1	45.2
Potato Hill	21C14	4500	1/1	33	10.3	13.2	12.8
			1/29	53	18.8	26.3	23.7
White Pass (E. Side)	21C28	4500	12/18	17	4.8	5.5	6.3
			12/31	23	6.6	9.6	9.6
			1/15	54	14.0	18.9	14.0
			1/29	40	12.7	20.9	18.2
White Pass (L. Lake)	21C27	4500	12/30	18	5.7	12.9	11.8
			1/27	41	13.9	23.4	22.0
Willame Creek	21C30	3250	1/1	28	8.8	11.6	10.8
			1/28	50	18.2	22.9	22.3
PUGET SOUND DRAINAGE							
NISQUALLY RIVER							
Ghost Forest	21C04	4550	12/29	48	19.8	20.6	13.6
			1/26	93	35.7	34.7	31.7
Longmire	21C03	2760	12/29	2.7	1.0	5.5	2.5
			1/26	17	6.8	12.7	8.3
New Paradise Park	21C35	5500	12/29	76	33.8	35.8	24.9
			1/26	130	54.8	59.2	50.2
Stem Glade	21C01	5050	12/29	80	32.4	32.4	24.9
			1/26	135	53.9	57.7	48.3
WHITE RIVER							
Cayuse Pass	21C06	5300	1/1	90	35.0	37.8	41.3
			1/28	143	61.2	60.5	58.7
Corral Pass	21B13	6000	1/30	80	30.4	-	-
Crystal Mtn.		6000	12/6	44	13.0	-	New
Morse Lake	21C17	5400	1/28	97	36.7	55.6	39.4
GREEN RIVER							
Airstrip	21B24	1800	12/27	0	0.0	2.0	2.5
			1/26	19	7.6	12.4	4.9
Charley Creek	21B25	1200	12/27	0	0.0	2.0	1.6
			1/26	0	0.0	1.0	1.5

Average based on 1958-72 average

+ Snow water equivalent estimated from aerial stadia observation

USDA SCS PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 10

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE						Water Content (inches)	
NAME	Number	Elevation	Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Last Year	Average #
GREEN RIVER (Cont.)							
Cougar Mountain	21B42SP	3200	1/7	22	4.6	8.4	-
			1/30	22	7.7	-	-
Grass Mtn. No. 2	21B27	2900	12/27	10	2.7	4.3	7.6
			1/26	18	6.7	12.2	15.3
Grass Mtn. No. 3	21B28	2100	12/27	1.4	0.3	3.5	2.6
			1/26	10	3.3	8.0	5.3
Lester Creek	21B29	3100	12/27	28	8.0	10.2	9.7
			1/26	52	17.4	22.8	17.8
Lynn Lake	21B50	4000	12/27	6.0	1.1	7.5	-
			1/26	17	8.7	18.3	-
Sawmill Ridge	21B31	4700	12/27	51	15.8	15.6	15.2
			1/26	76	29.0	33.0	28.6
Snowshoe Butte	21B43SP	5000	1/30	96	33.3	-	-
Stampede Pass SP	21B10	3860	12/4	-	12.7	8.8	6.3
			12/16	-	17.0	15.1	11.9
			1/1	-	23.2	-	16.5
			1/18	-	38.5	44.1	22.0
			1/29	-	38.4	46.8	28.7
Twin Camp	21B30	4100	12/27	26	7.7	10.7	11.3
			1/26	48	16.8	24.2	17.6
SNOQUALMIE RIVER							
Olallie Meadows	21B02	3625	1/30	79	32.5	-	32.7
SKYKOMISH RIVER							
Stevens Pass	21B01	4070	11/13	45	9.9	2.4	3.6
			11/26	43	13.0	9.2	8.9
			12/15	56	20.0	15.1	14.7
			12/30	71	25.3	29.4	21.7
			1/14	127	40.3	41.9	29.0
			1/31	98	39.8	46.0	37.0
Stevens Pass Sand Shed	21B45	4070	11/26	29	9.2	6.0	-
			12/15	39	13.4	9.9	-
			12/30	52	16.6	18.2	-
			1/14	98	28.0	29.3	-
			3/31	70	30.0	29.5	-
SKAGIT RIVER							
Beaver Creek Trail	21A04	2200	1/29	34	12.0	14.9	-
Beaver Pass	21A01	3680	1/28	62	23.6	20.6	-
Brown Top Ridge +	21A28a	6000	1/26	162	60.8	46.2	-
Cloudy Pass +	20A22a	6500	1/30	119	39.3	40.6	29.0

Average based on 1958-72 average

+ Snow water equivalent estimated from aerial stadia observation

USDA SCS PORTLAND OREGON 19/3

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 11

DRAINAGE BASIN and/or SNOW COURSE			THIS YEAR			PAST RECORD	
NAME	Number	Elevation	Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches) Last Year	Water Content (inches) Average + #
SKAGIT RIVER (Cont.)							
Devils Park	20A04	5900	1/28	122	45.5	39.6	31.9
Freezeout Creek Trail	20A01	3500	1/26	32	9.8	10.6	-
Freezeout Meadows New	20A38	5000	1/26	83	28.3	24.7	-
Granite Creek	21A29A	3500	1/29	57	19.2	16.4	-
Harts Pass	20A05A	6500	1/28	122	43.7	36.1	32.7
Lyman Lake	20A23A	5900	1/30	152	50.2	-	42.1
Meadow Cabins	20A08	1900	1/29	23	7.8	7.1	-
New Hozomeen Lake	21A30	2800	1/29	27	8.7	9.0	-
Rainy Pass	20A09	4780	1/28	117	38.7	35.6	29.5
Thunder Basin	20A07	4200	1/29	46	14.3	18.8	-
BAKER RIVER							
Baker Pass +	21A27a	4900	11/28	86	26.0	-	-
			12/31	114	40.0	35.0	-
			1/28	160	67.0	53.0	-
Dock Butte +	21A11A	3800	11/28	54	16.0	-	-
			12/31	73	26.0	32.0	-
			1/28	118	50.0	50.0	44.8
Easy Pass +	21A07A	5200	11/28	68	20.0	-	-
			12/31	125	44.0	42.0	-
Jasper Pass +	21A06A	5400	11/28	100	30.0	-	-
			12/31	145	51.0	52.0	-
			1/28	192	81.0	72.0	65.7
Marten Lake	21A09A	3600	11/28	86	26.0	-	-
			12/31	108	38.0	42.0	-
			1/28	155	65.0	58.0	52.2
Mt. Blum +	21A18a	5800	11/28	60	18.0	-	-
			12/31	117	41.0	36.0	-
Panorama New	21A26	4300	1/15	135	41.6	50.2	-
			2/1	99	48.2	51.2	-
Rocky Creek	21A12A	2100	11/28	22	7.0	-	-
			12/31	30	10.0	16.0	-
			1/28	50	21.0	25.0	21.5
Schreibers Meadow	21A10A	3400	11/28	47	14.0	-	-
			12/31	69	24.0	27.0	-
			1/28	80	34.0	34.0	39.9
S. F. Thunder Creek +	21A14A	2200	11/28	2.0	1.0	-	-
			12/31	6.0	2.0	8.0	-
			1/28	30	13.0	15.0	7.4
Watson Lakes	21A08A	4500	11/28	48	14.0	-	-
			12/31	62	22.0	34.0	-
			1/28	96	40.0	53.0	42.9

\# Average based on 1958-72 average

\+ Snow water equivalent estimated from aerial stadia observation

USDA-SCS-PORTLAND OREGON 1973

SNOW DATA TO FEBRUARY 1, 1976 - APPENDIX 12

SNOW			THIS YEAR			PAST RECORD	
DRAINAGE BASIN and/or SNOW COURSE			Date of Survey	Snow Depth (Inches)	Water Content (Inches)	Water Content (inches)	
NAME	Number	Elevation				Last Year	Average #
NOOKSACK RIVER							
Panorama New	21A26	4300	1/15	135	41.6	50.2	-
			2/1	99	48.2	51.2	-
OLYMPIC PENINSULA							
MORSE CREEK							
Cox Valley	23B14	4500	1/30	66	25.2	27.5	-
ELWHA RIVER							
Hurricane	23B03	4500	1/28	34	12.3	16.3	16.7
SKOKOMISH RIVER							
Black & White	23B07	4200	12/30	42	15.8	12.5	16.9
			1/27	56	22.5	23.8	30.5
Black & White Lakes	23B06	4700	12/30	51	21.8	22.2	26.0
			1/27	72	31.2	36.6	43.9
Four Streams	23B10	3000	12/30	7.0	3.2	3.8	15.1
			1/27	23	8.6	13.2	24.7
Home Sweet Home	23B05	5200	12/30	83	29.0	29.2	36.2
			1/27	115	46.3	45.2	56.5

USDA SCS PORTLAND OREGON 1973

Agencies Assisting with Snow Surveys

GOVERNMENT AGENCIES

Canada:

Department of Lands, Forests and Water Resources,
Water Resources Service, British Columbia

States:

Washington State Department of Ecology
Washington State Department of Natural Resources

Federal:

Department of the Army
Corps of Engineers
U. S. Department of Agriculture
Forest Service
U. S. Department of Commerce
NOAA, National Weather Service
U. S. Department of the Interior
Bonneville Power Administration
Bureau of Reclamation
Geological Survey
National Park Service

PUBLIC AND PRIVATE UTILITIES

Chelan County P.U.D.
Pacific Power and Light Company
Puget Sound Power and Light Company
Washington Water Power Company

OTHER PUBLIC AGENCIES

Okanogan Irrigation District
Wenatchee Heights Irrigation District

MUNICIPALITIES

City of Tacoma
City of Seattle

Other organizations and individuals furnish valuable information for snow survey reports. Their cooperation is gratefully acknowledged.

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